

Crosby, Michael

From: Carter, Lonnie
Sent: Monday, November 28, 2016 1:08 PM
To: MARSH, KEVIN B (KMARSH@scana.com)
Subject: Wednesday's SCE&G/Santee Cooper meeting
Attachments: Nuclear Timelines--Project Management.docx; Nuclear Timeline-Bankruptcy.docx; Securitization Assessment Nov 28 2016.doc.docx

Kevin,

This letter is sent to assist you in preparation for our meeting on Wednesday (11/30), as both our teams prepare for the joint Board meeting scheduled on December 5. We both share the strong desire to work as a team to see the Summer 2&3 Project successfully completed. This letter is offered in that spirit:

From Santee Cooper's perspective, there are 3 primary items we need to discuss on Wednesday. Candidly, the first two have become items of frustration for Santee Cooper, and have put me in an awkward position with my Board, who are insisting to know why no action has been taken. I asked Santee Cooper's team to prepare timelines which show when the items were raised and discussed. These timelines are written from Santee Cooper's perspective, and perhaps will provide insight to your team.

1. Increased project management expertise in large scale EPC construction.
2. Bankruptcy counsel.
3. Release of the Bechtel Report to the Cooperatives.

Increased project management expertise in large scale EPC construction--We need to be prepared to discuss with our Board, after two years of requests and an affirmative commitment from you on more than one occasion, why this has not yet been done. The attached timeline is illustrative.

The formation of the CORB was SCANA's response to the Betchel Report and Santee Cooper's request for better Project oversight with large EPC experience. Based on the recommendations we heard at both CORB briefings, I am concerned that we learn critical information too late from an outside team that comes in quarterly for a few days, which should have been brought to our attention by our teams. The information we learned last week was very important and key to the effectiveness of our President's Meetings with WEC and Fluor.

As we discussed following the call, we must determine if our teams have the knowledge and expertise to glean this key information. If they do have the knowledge and expertise, then what are the reasons the information does not reach us? If they do not have the knowledge and expertise, what can be done to staff in such a manner to have this information available in a timely manner? I recommend that we move quickly to act on the CORB's recommendations and set specific timeframes for our team to implement.

Bankruptcy counsel—Bankruptcy expertise would significantly inform our team as we negotiate with WEC going forward. Our separate, collective and independent analysis suggests that the fixed price option offered by WEC is likely significantly less than the cost WEC will incur to complete the Project. This is the very reason that we selected the fixed price. Regrettably, we must anticipate WEC having financial difficulty completing the Project, particularly in a timely manner. We should consider all options available to us that will insure WEC lives up to our Agreement. Our strategies should contemplate potential bankruptcies for both WEC and Toshiba. Toshiba's weakened financial condition is an unfortunate development as WEC's guarantor that we must also consider.

After no action on our repeated requests on this topic, as indicated in the attached timeline, I asked our legal team to find bankruptcy counsel. When we advised the SCANA team of this and our recommendation, no response has been received. This issue is of such concern to the Santee Cooper Board (as the timeline shows this was brought up at our first joint Board meeting) that I further asked our legal team to conduct an assessment of the securitization of the Project in the event WEC is unable to finish. This is something that

would typically be undertaken by counsel with bankruptcy expertise. The securitization assessment is attached for your benefit. We will be prepared to discuss it further on Wednesday.

Release of the Bechtel Report to the Cooperatives—We are backed into a corner on this. Our largest customer, having learned of it through intervention in SCE&G's fixed price petition, demands a copy of the report. Our requests to your legal team to put some parameters around the disclosure has been met with the response that we should not release it. Not releasing this information will likely bring formal requests that will be an untenable position for both our companies.

We look forward to our discussion on Wednesday.

Thanks,
Lonnie

Nuclear Timeline—Additional Project Management Request

For well over two years, the Santee Cooper Board and management team have been pressing SCANA to substantially enhance the construction project management team by repeated direct requests, through the Bechtel analysis, and via the CORB process, as indicated by the timeline below.

Timeline: Project Management

- May 2014: **Roll-up Letter** - Shortly after sending the May 2014 roll-up letter to WEC receiving the \$1B EAC (Aug), Santee Cooper began discussions with SCE&G executives to engage outside assistance with management of the EPC contract.
- Sep 3, 2014: **Marsh email to Carter (September 3, 2014 at 2:06:00 PM EDT) ...**

“We are ready to move forward with hiring/engaging an additional resource with significant construction expertise to assist us with evaluating the construction schedule and project status. I believe having this person on our staff vs. working as a consultant will avoid conflicts with the consortium on proprietary matters.”
- Feb 17, 2015: **SCANA Meeting (Timmerman’s old office)** - Marsh, Byrne, Carter, Watson, Crosby) - Santee Cooper suggests Bechtel for project review, providing SCANA with a project assessment proposal to assist in identifying areas for improvement.
- Apr 7, 2015: **Bechtel Meeting (SCANA Hangar)** - Team Marsh, Team Carter, & Bechtel – Bechtel introduces its nuclear team and presents assessment proposal. Kevin agrees to seek SCANA Board approval to go forward with an assessment.
- Apr - Aug: **SCANA and Santee Cooper Board approvals received** - to move forward with a Bechtel project assessment.
- Aug 10, 2015: **Bechtel Assessment** – finally begins. Much time lost April through July getting Roderick & Asherman engaged and NDAs and PO in place. To push forward, Santee Cooper made the Bechtel assessment a “requirement” to proceed with the (stalled) negotiations that eventually led to CB&I exiting the Project.
- Aug – Oct: **Bechtel Calls** – Craig Albert holds weekly calls with Marsh & Carter. SCANA NND project leadership has limited involvement in the assessment. Cherry steps up to lead effort on behalf of Owners. Cherry engages Archie in a daily effort to force WEC (Benjamin / Roderick) to release engineering & schedule documents. Carl Rau & Roderick eventually have a heated email exchange. Documents are finally released to a reading room only - the assessment effort is a challenge.
- Oct 22, 2015: **Bechtel Meeting (SCANA HQ)** – Bechtel executive level report-out of project assessment, findings, and high-level recommendations. Bechtel promises a final report in 2–3 weeks. SCANA management expresses hesitation, routes

assessment through legal department, indicates concern Bechtel's objective is to seek a long-term engagement on the Project.

Nov 12, 2015: **Bechtel Assessment Report – issued to George Wenick** - Weeks go by with Wenick/Bechtel wrangling over Wenick's rejection of initial report, redactions, timeline removal, critique of project management. Baxley, Pelcher, Lindsay, and Bynum meet with Wenick (in Atlanta) for a review and final disposition of report.

Feb 5, 2016: **Bechtel Project Assessment Report** – Numbered copies of final report released to Santee Cooper by SCANA.

Mar 4, 2016: **Santee Cooper Recommendations** – Five formal recommendations forwarded to Marsh:

1. Construction Milestone Payment Schedule
2. Project Evaluation and Assessment by Owners
3. Quarterly Meetings with Toshiba / WEC / Fluor
4. Evaluation of Fixed Price Option
5. Professional Oversight of EPC Agreement

Mar 7, 2016: **SCANA Meeting (Kevin's conference room)** – Marsh, Byrne, Archie, Lindsay, Bynum, Team Carter – group discusses Bechtel Report and Santee Cooper formal recommendations. Carter praises SCANA's project management team for its operations experience and ability to work well with NRC, but expresses concern over inability to hold Consortium accountable.

Marsh agrees to have the SCANA and Santee Cooper teams study the Bechtel Report, agree on actionable recommendations. Marsh agrees to add EPC resources to his team to fill any gaps/needs identified.

Marsh, Byrne & Archie float Construction Oversight Review Board (CORB) approach as a possible resource solution ... same was being used at Vogtle.

CMPS – at Santee Cooper's request, Marsh agrees to hire Bechtel (Jason Moore) on a limited scope basis to assist team in development of the CMPS. Action assigned to Archie. Archie first attempts to hire Jason Moore as an independent contractor. Subsequently, Craig Albert instructs his staff to move on.

Mar 11, 2016: **CEO Meeting (Columbia)** - Marsh, Harold Stowe, Carter, Leighton Lord – meet to discuss Santee Cooper's formal recommendations and expectations of SCANA for the planned Mar 21 Joint Board meeting.

Mar 18, 2016: **Marsh email to Carter (March 18, 2016 at 8:25:34 AM EDT)** ... pertinent excerpts provided below:

"Our team is looking forward to meeting with the Santee Board next Monday ..."

"We appreciate the effort behind the recommendations provided to us regarding your views on project issues. We have carefully considered your concerns and, as we discussed in our meeting last week, we appear to be in alignment on the first four. We agree in principle with the concern expressed in Item 5 related to additional oversight of the project and have a plan of action that we believe will address the issue appropriately. Our first step in this regard is to staff a Construction Oversight Board.

"Next we would seek an appropriate number of experienced EPC, and/or large construction project personnel to add to the new nuclear team. These individuals would be available to assist the current Project Management Office team and site leadership in assessing and addressing issues arising during construction. I am confident that the number and specific type of personnel needed in this capacity will be informed by the work of our teams who are currently summarizing a list of recommendations for the project going forward. We expect these teams to complete their work and provide a report to senior management by the end of April."

Mar 21, 2016: **Joint Board Meeting 1 (Columbia Hilton)** – discussed Bechtel Report, Santee Cooper March 3 formal recommendations and SCANAs plan forward to address issues.

Marsh committed that SCANA and Santee Cooper would work to identify actionable Bechtel recommendations. SCANA would add EPC experts to its team, and that SCANA would charter a V.C. Summer Construction Oversight Review Board to help SCANA with project execution.

Apr 7, 2016: **SCANA feedback on Bechtel Assessment** – Cherry and Crosby meet with Archie and Bynum. In response to Marsh's request for the teams to work on the Bechtel assessment recommendations, Bynum gave Santee Cooper a spreadsheet containing SCANA feedback from several members of the NND project management team. Brad Stokes (SCANA Manager of Engineering) had not been a part of the Bechtel assessment review effort, even though many issues tied to engineering were impeding progress on the Project.

Apr 15, 2016: **Santee Cooper feedback on Bechtel Assessment** – Also in response to Marsh's request for the teams to work together on the Bechtel assessment, Santee Cooper forwarded Archie and Bynum Santee Cooper's formal review of the Bechtel assessment which included a cross-reference to SCANAs feedback. Santee Cooper's feedback was consistent with its Mar 3rd recommendations calling for the addition of EPC expert resources to assist SCANA project management with executing Bechtel recommendations on engineering, procurement, project controls & scheduling.

Archie called Crosby and Byrne emailed Crosby a few days later and confirmed that they had received and reviewed Santee Cooper's feedback ... and that the teams were in agreement.

May 19, 2016: **SCANA meeting – CMPS & Bechtel Assessment** – Marsh, Byrne, Archie, Carter, Crosby, Cherry meet.

CMPS: WECs front-end loaded CMPS discussed in detail. Santee Cooper again requested SCANA seek outside expertise to assist Owners with this issue.

Bechtel Assessment: Due to the progress WEC & Fluor appear to be making on procurement issues – Santee Cooper agreed to narrow the focus of the Bechtel recommendations to only engineering issues.

Jun 17, 2016: **Santee Cooper Board Meeting (Wampee)** – Fixed Price Option formally introduced to the Santee Cooper Board. .

Jun 18, 2016: **Crosby email to Archie (June 18, 2016 10:50 AM EDT)** – Marsh, Carter and Byrne were copied ... pertinent excerpts provided.

“Yesterday, Marion brought me the attached document that you gave him Thursday on the Project Assessment Report.... SCANAs recommendation, and apparent next step, is to perform (another) 3rd party assessment on how to make things better.....I am not supportive of just another 3rd party assessment. The assessment completed Q3 2015, at a cost of \$1M, was sufficient for Santee Cooper to recognize the need to on-board experts help to work on key issues and improve the management of the Project.” No response was received.

Jun 20, 2016: **Joint Board Meeting 2 (Nexsen Pruet)**

Fixed Price Option: SCANA presents its analysis of the Fixed Price Option.

CORB: Peggy Pinnell (Santee Cooper Director) reminds Archie of his commitment in the Mar 21 joint meeting to get the CORB established as soon as possible. Archie recommits to getting the CORB established by Jul 20.

Aug 2016: **CORB Review #1** – The Construction Oversight Review Board held its first review in Jul & Aug. The initial review provided for a high-level review of the project schedule, construction, construction to startup turnover planning, engineering, startup, project management, procurement, document control, vendor supplied equipment, and component testing. An executive level exit meeting was held on Aug 18 – primary takeaways follow:

- Schedule has too many activities (238K vs 60K at Watts Bar 2)
- Subcontracts are not in schedule
- Engineering is impeding construction
- Engineering not in schedule – being handled by lists
- Project Management – must get aggressive to hold EPC accountable. Team will not make it without some help

CORB Chairman (Skaggs) promised final report in 2 weeks.

Sep 16, 2016: **Draft CORB Report #1** – received from SCANA after Carter discussed with Marsh that the report was past due. Report was in-house SCANA and being reviewed by Archie. Bynum forwarded a copy to Baxley and reminded Santee Cooper the report was confidential.

Oct 13, 2016: **SCANA action on CORB Report #1** – Williams requests an update from Archie on Oct 5. Jones forwards a report on Oct 13. The information received was primarily a report on what WEC & Fluor are doing to address CORB recommendations on schedule, engineering, project metrics, etc.

Conclusion: SCANA's project management team has many areas of strength (nuclear safety culture, operations, NRC management) but does not have the comprehensive skills and depth of experience necessary in engineering, scheduling, project controls and construction to manage a large new build project laced with complexities. Those complexities being (1) a first of a kind nuclear technology (2) being deployed by an over-extended equipment manufacturer (Westinghouse), (3) backed by an incompetent engineering firm responsible for project integration (Stone & Webster now WECTEC), and (4) a Contractor that has been disingenuous on multiple issues. The Project would be greatly benefitted by infusing the current project management team with a framework of qualified EPC managers charged with working collaboratively with the Owner and Consortium to identify areas for improvement, suggest proven solutions, and to provide an independent perspective on actual progress – the effort aimed at increasing the accountability of the Consortium and the success of the Project. After three years of project delays, and now another five months of Unit 2 delay realized in 2016 – there should be no shame in reaching out for qualified assistance.

Nuclear Timeline—Project Bankruptcy Counsel

Beginning with the precipitous decline of Toshiba's credit rating and financial strength, the Santee Cooper Board and management team have been requesting that SCANA retain bankruptcy counsel for the project. The following timeline is illustrative:

Timeline: Bankruptcy Counsel

April 2015: Toshiba announces accounting scandal.

July 21, 2015: Toshiba senior executives and Board of Directors resign.

Dec 22, 2015: Moody's reduces Toshiba long term bond rating to junk status.

Mar 2016: Santee Cooper approaches Nelson Mullins bankruptcy counsel about Project, conflicts check shows WEC is a client of Nelson Mullins in some capacity.

Mar 21, 2016: **Joint Board Meeting 1 (Columbia Hilton)** – Boards discussed declining financial condition of Toshiba and what financial response the Owners should make to poor project progress. Owners' counsel met with George Wenick that afternoon and Santee Cooper requested that bankruptcy counsel be retained for the Project as a proactive measure given Toshiba's and potentially WEC's financial condition.

Apr 4, 2016: **Pelcher email to Bynum (April 4, 2016 4:01 PM EDT)** – pertinent excerpt

"... has SCE&G secured a project bankruptcy attorney to help us think through how Toshiba's financial difficulties might impact Westinghouse and ultimately us? You may recall this is a topic we discussed during our Mar 21 (post board meeting) nuclear attorneys meeting ..."

Jun 7, 2016: **Crosby email to Byrne (June 07, 2016 6:03 PM EDT)** – pertinent excerpts

"... Lonnie asked me to forward you and Kevin a proposed agenda for the joint meeting on the 20th. Here is what I have so far ... welcome your comments.

1. Fixed Price Option

- a. SCANA analysis – presentation
- b. PSC Testimony – any comments that can be shared
- c. Draft SCANA letter to Santee Cooper – recommending FPO
- d. Potential Bankruptcy – outside legal opinion & plan to address"

Jun 16, 2016: **Marsh email to Carter (June 16, 2016, at 3:39 PM)** – pertinent excerpts

"Based on our internal discussions, we propose an agenda as follows:

1. Follow-up on issues from our last joint meeting;
2. Consideration of the fixed price option; and
3. Update on the milestone schedule/Dispute Resolution Board (DRB) issue"

"Through a number of emails I have seen other topics that your board may want to discuss. We are prepared to do that, but we believe that such a discussion should occur when we have more time. Issues, such as the potential bankruptcy of Toshiba or Westinghouse are critical, but would prefer to have some detailed discussions and debate within our project teams before making a formal presentation to either of our boards."

Jun 16, 2016: **Carter email to Marsh (Jun 16, 2016, 7:20 PM)** – pertinent excerpts

"... Finally, I agree with you that further staff level discussion on the ramifications of a Toshiba or Westinghouse bankruptcy would be useful and should precede any formal presentations to our boards on this matter. With that said, the possibility of such a bankruptcy cannot be entirely divorced from our joint board discussions on Monday. For example, Item No. 2 on your agenda relating to the fixed price option obviously shifts risk away from the Owners and to Toshiba/Westinghouse, making their credit worthiness all the more important. Similarly, with respect to Item No. 3, getting the milestone payment schedule right will make it less likely that Westinghouse view as desirable a strategic Chapter 11 bankruptcy to rid itself of uneconomical executory contract."

Jun 17, 2016: **Carter email to Marsh (June 17, 2016 5:12 PM)** – pertinent excerpts

"At today's Santee Cooper Board meeting several questions regarding the implications of a Toshiba bankruptcy came up. Some we could address others not. I would anticipate similar questions Monday....."

Jun 23, 2016: **Pelcher email to Bynum (June 23, 2016, at 5:12 PM)** – pertinent excerpts

"... At one of my notes from Monday's Joint SCANA/Santee Cooper Board Meeting in Columbia was an interest by members of the respective boards in retaining project bankruptcy counsel to provide strategic advice on the challenges associated with Toshiba's financial difficulties arising out of last year's accounting scandal and the risk that posed to the Owners and the project."

"As I understood the discussion from Monday, our joint boards had an interest in retaining as project counsel someone who would be able to represent us both now and in the event of a bankruptcy without having to get a waiver from Westinghouse or Toshiba. My notes indicate that you tasked George Weniek to identify potential project bankruptcy counsel for this purpose."

"One more thing - - and just speaking for myself - - in the penultimate paragraph of his June 16, 2016, at 3:39 PM Email, below, Kevin Marsh advanced the idea of

possibly making a "formal presentation" to our boards on the bankruptcy/insolvency issue after some further analysis/discussion among staffs of SCE&G and Santee Cooper. Given the demonstrated interest in this issue by our board, I think this is a very good idea."

"I would think that the content of such a board presentation would be informed not only by the analysis of the project bankruptcy attorney we eventually (hopefully very soon) retain, but also by a more granular understanding of Toshiba's and Westinghouse's financial situation. Although as a Japanese company the particulars of Toshiba's financial situation might be a bit opaque to us over here, I would think that there would be resources availability to allow us to develop a better picture of its situation and prospects."

Jun 24, 2016: **Bynum email to Pelcher (June 24, 2016 1:53 PM)** – pertinent excerpt

"Ron and I talked to George yesterday about adding bankruptcy support. He is looking for candidates. We are likely comfortable with whoever he suggests"

Jun 30, 2016: **Pelcher email to Bynum (June 30, 2016 11:41 AM)** – pertinent excerpt

Al: Following Up on our Email Exchange of late last week on bankruptcy counsel, and anticipating that this issue might be raised by one of our board members in connection with today's meeting, has any progress been made in securing project bankruptcy counsel? As you may remember, the issue of WEC/Toshiba bankruptcy/insolvency was on the mind of several of our board members during the June 20th Joint Meeting."

Jun 30, 2016: **Bynum email to Pelcher (June 30, 2016 2:59 PM)** – pertinent excerpt

"George will have to answer your bankruptcy question – we delegated that to him"

Aug 19, 2016: **Pelcher email to Bynum (August 19, 2016 8:43 AM)** – pertinent excerpt

"Al: As you may know, the Santee Cooper meeting on Monday, August 22nd. There will be the now normal update on V.C. Summer Units 2 and 3 in Executive Session. I will be on hand to answer questions of a legal variety that may arrive. "

"QUESTION: If asked by a board member in Executive Session about the status of securing project bankruptcy counsel, what should I tell them?"

Sep 28, 2016: **Pelcher email to Wenick / Bynum (September 28, 2016 2:20 PM)** – pertinent excerpts

"George/Al: I was on the Executive Floor today and a question came up about whether George has made any progress in identifying a project bankruptcy counsel? You may recall, that this is a matter that our joint boards discussed during their June 20th meeting. I have pasted below for your convenience prior Email on this matter."

"The next Santee Cooper Board meeting is scheduled for October 14th and I anticipate this issue coming up at that time."

Oct 24, 2016 **Carter and Baxley travel to New York and meet with Dentons, LLC attorneys regarding project bankruptcy counsel.**

Oct 25, 2016 **Carter letter to Marsh:**

During the June 20 joint meeting, members of both our Boards expressed concern about the financial difficulties being faced by Toshiba Corporation and Westinghouse Electric Company and how those problems could possibly impact the timely and successful completion of the project. One action item that SCANA agreed to take on was securing Project Bankruptcy Counsel who would help us think through Toshiba/Westinghouse insolvency scenarios so that we might begin planning now on how mitigate the impact of such an unfortunate possibility. Indeed, in a June 16, 2016 email to me, you expressed the very same concerns describing "the potential bankruptcy of Toshiba or Westinghouse [as] critical" but expressing the "prefer[ence] to have some detailed discussions and debate within our project teams before making a formal presentation to either of our Boards." The time for that formal presentation to the Board has arrived.

Oct 28, 2016 **Email from Baxley to Marsh and SCANA legal team:**

I'm pleased to report that this week we have located bankruptcy counsel for the nuclear construction project. Stuart Caplan of Dentons New York office has assembled an energy/large construction group with whom we met this week. Stu is well known to Santee Cooper and has represented us in multiple issues over three decades. He is assisted by Farrington Yates who focuses on large scale construction bankruptcies representing creditors. The third member of the team is a large construction project risk avoidance specialist who has litigated the aftermath of multiple mega projects and personally knows at least one of our DRB—John Hinchey—and made several accurate observations about his personality.

No reply received from any recipient.

Confidential/Proprietary/Attorney Work Product

EPC Securitization Assessment

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Respectfully Submitted,

Nuclear Project Securitization Team

J. Michael Baxley
Michael R. Crosby
Elizabeth H. Warner
Stephen R. Pelcher
Rahul Dembla

November 28, 2016

STATE OF SOUTH CAROLINA

FILED
2018/09/27/15

256748 SA

(Caption of Case)

Petition of South Carolina Electric & Gas Company
for Updates and Revisions to Schedules Related to
the Construction of a Nuclear Base Load Generation
Facility at Jenkinsville, South Carolina

BEFORE THE
PUBLIC SERVICE COMMISSION
OF SOUTH CAROLINA

COVER SHEET

DOCKET
NUMBER: 2015 - 103 - E

(Please type or print) Submitted by: Belton Zeigler

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NOTE: The cover sheet and information contained herein neither replaces nor supplements the filing and service of pleadings or other papers as required by law. This form is required for use by the Public Service Commission of South Carolina for the purpose of docketing and must be filled out completely.

DOCKETING INFORMATION (Check all that apply)

☐ Emergency Relief demanded in petition

☐ Request for item to be placed on Commission's Agenda expeditiously

☐ Other:

INDUSTRY (Check one)	NATURE OF ACTION (Check all that apply)			
<input checked="" type="checkbox"/> Electric	<input type="checkbox"/> Affidavit	<input type="checkbox"/> Letter	<input type="checkbox"/> Request	
<input type="checkbox"/> Electric/Gas	<input type="checkbox"/> Agreement	<input type="checkbox"/> Memorandum	<input type="checkbox"/> Request for Certification	
<input type="checkbox"/> Electric/Telecommunications	<input type="checkbox"/> Answer	<input type="checkbox"/> Motion	<input type="checkbox"/> Request for Investigation	
<input type="checkbox"/> Electric/Water	<input type="checkbox"/> Appellate Review	<input type="checkbox"/> Objection	<input type="checkbox"/> Resale Agreement	
<input type="checkbox"/> Electric/Water/Telecom.	<input type="checkbox"/> Application	<input type="checkbox"/> Petition	<input type="checkbox"/> Resale Amendment	
<input type="checkbox"/> Electric/Water/Sewer	<input type="checkbox"/> Brief	<input type="checkbox"/> Petition for Reconsideration	<input type="checkbox"/> Reservation Letter	
<input type="checkbox"/> Gas	<input type="checkbox"/> Certificate	<input type="checkbox"/> Petition for Rulemaking	<input type="checkbox"/> Response	
<input type="checkbox"/> Railroad	<input type="checkbox"/> Comments	<input type="checkbox"/> Petition for Rule to Show Cause	<input type="checkbox"/> Response to Discovery	
<input type="checkbox"/> Sewer	<input type="checkbox"/> Complaint	<input type="checkbox"/> Petition to Intervene	<input type="checkbox"/> Return to Petition	
<input type="checkbox"/> Telecommunications	<input type="checkbox"/> Consent Order	<input type="checkbox"/> Petition to Intervene Out of Time	<input type="checkbox"/> Stipulation	
<input type="checkbox"/> Transportation	<input type="checkbox"/> Discovery	<input checked="" type="checkbox"/> Prefiled Testimony	<input type="checkbox"/> Subpoena	
<input type="checkbox"/> Water	<input checked="" type="checkbox"/> Exhibit	<input type="checkbox"/> Promotion	<input type="checkbox"/> Tariff	
<input type="checkbox"/> Water/Sewer	<input type="checkbox"/> Expedited Consideration	<input type="checkbox"/> Proposed Order	<input type="checkbox"/> Other: _____	
<input type="checkbox"/> Administrative Matter	<input type="checkbox"/> Interconnection Agreement	<input type="checkbox"/> Protest		
<input type="checkbox"/> Other: _____	<input type="checkbox"/> Interconnection Amendment	<input type="checkbox"/> Publisher's Affidavit		
	<input type="checkbox"/> Late-Filed Exhibit	<input type="checkbox"/> Report		

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May 26, 2015

VIA HAND DELIVERY

The Honorable Jocelyn G. Boyd
Chief Clerk/Administrator
Public Service Commission of South Carolina
101 Executive Center Drive
Columbia, South Carolina 29210

RE: Petition of South Carolina Electric & Gas Company for Updates and Revisions to Schedules Related to the Construction of a Nuclear Base Load Generation Facility at Jenkinsville, South Carolina
Docket No. 2015-103-E

Dear Ms. Boyd:

South Carolina Electric & Gas Company ("SCE&G") is hereby filing with the Public Service Commission of South Carolina ("Commission") one (1) copy of the direct testimony and exhibits of the following SCE&G witnesses in the above-referenced docket.

1. Kevin B. Marsh (public version of direct testimony only)
2. Stephen A. Byrne (public version of direct testimony and exhibits only)
3. Ronald A. Jones (public version of direct testimony and exhibits only)
4. Joseph M. Lynch (public version of direct testimony and exhibit only)
5. Carlette L. Walker (public version of direct testimony and public and confidential versions of exhibits)

We are also enclosing a compact disc which contains an electronic version of the public version of SCE&G's direct testimony and exhibits for uploading to the Commission's Docket Management System.

As stated above, Ms. Walker is the only SCE&G witness with confidential information contained within certain exhibits attached to her direct testimony. As a result, SCE&G is filing both confidential and public versions of her exhibits. The confidential versions of her exhibits contains confidential information related to the pricing and pricing terms of the Engineering, Procurement and Construction Agreement ("EPC Contract") between SCE&G and a consortium consisting of Westinghouse Electric Company, LLC and Chicago Bridge & Iron. (together, "Contractor"). The EPC Contract contains confidentiality provisions that require SCE&G to protect proprietary information that the Contractor believes to constitute trade secrets and to be commercially sensitive. The exhibits to Ms. Walker's direct testimony containing confidential

May 26, 2015

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information are as follows: Exhibit No. ____ (CLW-1-C), Exhibit No. ____ (CLW-4-C), Exhibit No. ____ (CLW-5-C), Exhibit No. ____ (CLW-6-C), and Exhibit No. ____ (CLW-7-C). The Contractor has requested that SCE&G maintain the confidentiality of certain information contained in the testimony and exhibits. In each case, the confidential information has been redacted from the public versions of the exhibits, and the exhibits containing the confidential information have been marked as "Confidential."

In keeping with the Contractor's request and the terms of the EPC Contract, SCE&G respectfully requests that the Commission find that Exhibit No. ____ (CLW-1-C), Exhibit No. ____ (CLW-4-C), Exhibit No. ____ (CLW-5-C), Exhibit No. ____ (CLW-6-C), and Exhibit No. ____ (CLW-7-C) contain protected information and issue a protective order barring the disclosure of the documents under the Freedom of Information Act, S.C. Code Ann. §§ 30-4-10 *et seq.*, S.C. Code Ann. Regs. 103-804(S)(1), or any other provision of law, except in its public form. Pursuant to 10 S.C. Code Regs. 103-804(S)(2), the determination of whether a document may be exempt from disclosure is within the Commission's discretion. Such a ruling in this instance would be consistent with the Commission's prior rulings. *See, e.g.*, Docket Nos. 2008-196-E, 2009-293-E, 2010-157-E, 2010-376-E, 2012-186-E, and 2012-203-E (ruling the pricing and pricing terms of the EPC Contract to be confidential and issuing a protective order barring the disclosure of this information).

To this end, and in accordance with Commission Order No. 2005-226, dated May 6, 2005, in Docket No. 2005-83-A, we enclose with this letter redacted Public Versions of the direct testimony and exhibits specified above, which protects from disclosure the sensitive, proprietary and commercially valuable information, while making available for public viewing non-protected information.

Moreover, we also enclose a copy of the unredacted Confidential Versions of the following in a separate, sealed envelope.

- (1) A true and correct copy of the Confidential Version of Exhibit No. ____ (CLW-1-C), in a sealed envelope marked "CONFIDENTIAL." Each page of the Exhibit is marked "CONFIDENTIAL."
- (2) A true and correct copy of the Confidential Version of Exhibit No. ____ (CLW-4-C), in a sealed envelope marked "CONFIDENTIAL." Each page of the Exhibit is marked "CONFIDENTIAL."
- (3) A true and correct copy of the Confidential Version of Exhibit No. ____ (CLW-5-C), in a sealed envelope marked "CONFIDENTIAL." Each page of the Exhibit is marked "CONFIDENTIAL."
- (4) A true and correct copy of the Confidential Version of Exhibit No. ____ (CLW-6-C), in a sealed envelope marked "CONFIDENTIAL." Each page of the Exhibit is marked "CONFIDENTIAL."

May 26, 2015

Page 3


- (5) A true and correct copy of the Confidential Version of Exhibit No. ____ (CLW-7-C), in a sealed envelope marked "CONFIDENTIAL." Each page of the Exhibit is marked "CONFIDENTIAL."

SCE&G respectfully requests, in the event that anyone should seek disclosure of the unredacted Confidential Versions of the above-referenced exhibits, that the Commission notify SCE&G of such request and provide it and the Contractor with an opportunity to obtain an order from this Commission or a court of competent jurisdiction protecting the Confidential Version of these documents from disclosure.

By copy of this letter, we are also serving the other parties of record with a copy of the public versions of testimony and exhibits and attach a certificate of service to that effect.

If you have any questions regarding these matters, please do not hesitate to contact us.

Very truly yours,
**WOMBLE CARLYLE SANDRIDGE &
RICE A Limited Liability Partnership**


Belton T. Zeigler

KCB/kms
Enclosures

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BEFORE THE PUBLIC SERVICE COMMISSION OF SOUTH CAROLINA
COLUMBIA, SOUTH CAROLINA

HEARING #15-11488 JULY 21, 2015 10:35 A.M.

DOCKET NO. 2015-103-E:

SOUTH CAROLINA ELECTRIC & GAS COMPANY – *Petition of South Carolina Electric & Gas Company for Updates and Revisions to the Capital Cost Schedule and Schedules Related to the Construction of a Nuclear Base Load Generation Facility at Jenkinsville, South Carolina*

TRANSCRIPT OF TESTIMONY
AND PROCEEDINGS

VOLUME 1 OF 3

HEARING BEFORE: Nikiya M. 'Nikki' HALL, *Chairman*; Swain E. WHITFIELD, *Vice Chairman*; and COMMISSIONERS John E. 'Butch' HOWARD, Elliott F. ELAM, JR., Comer H. 'Randy' RANDALL, Elizabeth B. 'Lib' FLEMING, and G. O'Neal HAMILTON

ADVISOR TO COMMISSION: F. David Butler, Esq.
Senior Counsel

STAFF: Joseph Melchers, General Counsel; James Spearman, Ph.D., Executive Assistant to Commissioners; David W. Stark, III, Esq., Legal Staff; Philip Riley, Doug Pratt, Lynn Ballentine, and Tom Ellison, Advisory Staff; Jo Elizabeth M. Wheat, CVR-CM/M-GNSC, Court Reporter; and William O. Richardson and Colanthia Alvarez, Hearing Room Assistants

APPEARANCES:

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Docket 2015-103-E *South Carolina Electric & Gas Co.*
Nuclear Construction Updates and Revisions

2

APPEARANCES (Cont'g) :

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INTERVENOR

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HUDSON, ESQUIRE, representing the SOUTH CAROLINA OFFICE OF
REGULATORY STAFF

VOL 1 OF 3 - 7/21/15

PUBLIC SERVICE COMMISSION OF SOUTH CAROLINA

Docket 2015-103-E South Carolina Electric & Gas Co.
Nuclear Construction Updates and Revisions

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- Volume 3 (7/22/15) comprises pages 394-743



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SCE&G Uses World's Largest Crane to Lift and Set 2.4-Million Pound Module
Progress Also Made With Shield Building Construction

CAYCE, S.C., July 23, 2015—South Carolina Electric & Gas Company (SCE&G), principal subsidiary of SCANA Corporation (NYSE:SCG), and its partners placed on July 23 the 2.4-million pound CA01 module that will house a number of major components in the first of two new nuclear plants at the V.C. Summer site.

"Successful placement of this major module demonstrates the progress being made with our new nuclear units that are under construction at V.C. Summer," said Kevin Marsh, SCANA chairman and CEO. "Adding more nuclear energy to our generation mix is the best solution for providing South Carolina large-scale energy that is clean, safe, and reliable, as well as cost-effective over the long-term."

This is the first Westinghouse AP1000 module of its kind to be placed in the U.S., and it is the heaviest lift on the V.C. Summer nuclear construction site. One of the world's largest cranes, a heavy lift derrick that stands approximately 560-feet tall, was used to lift this massive module.

The CA01 module is a multi-compartment steel structure within the Unit 2 containment vessel. It is approximately 90 feet long, 95 feet wide, and 80 feet high. Considered a super module because it is too large to transport, CA01 was assembled on the construction site in a 12-story Module Assembly Building.

Lonnie Carter, president and CEO of Santee Cooper, co-owner of V.C. Summer, said, "The successful placement of the CA01 module marks a significant milestone for this project. The new nuclear units at V.C. Summer remain a critical component of Santee Cooper's long-term plan to diversify our generation mix and to continue to provide low-cost, reliable and environmentally-sound electricity to our customers."

In addition to this significant milestone, another milestone was achieved just a few days before for V.C. Summer Unit 2. The first six-panel course of nearly 170 shield building panels was placed on July 17. Weighing 30,000 pounds and spanning 40 feet long, each panel will be welded together. Concrete will then be poured inside the panels to create the shield building. When complete, this reinforced concrete structure will surround the containment vessel for another layer of safety.

See pictures and video of these construction milestones by visiting SCE&G on [Flickr](#) and [YouTube](#).

Approximately 3,500 CB&I and Westinghouse personnel and subcontractors are employed on the nuclear construction site in Fairfield County, S.C., where V.C. Summer Unit 1 has operated safely and reliably for more than 30 years and V.C. Summer Units 2 and 3 are being built.

The two 1,117-megawatt units will add approximately 800 permanent jobs when operational. Once the two units are complete, SCE&G anticipates its generation mix will be about 30 percent nuclear, 30 percent natural gas, and 30 percent scrubbed coal, with the balance in hydro, solar and biomass.

PROFILE

SCE&G is a regulated public utility engaged in the generation, transmission, distribution and sale of electricity to approximately 692,000 customers in South Carolina. The company also provides natural gas service to approximately 342,000 customers throughout the state. More information about SCE&G is available at www.sceg.com.

SCANA Corporation, headquartered in Cayce, S.C., is an energy-based holding company principally engaged, through subsidiaries, in electric and natural gas utility operations and other energy-related businesses. Information about SCANA and its businesses is available at www.scana.com.

###

[SCANA] - SCANA Corporation Second Quarter 2015 Earnings Conference Call/Webcast
Thursday, July 30, 2015 3:00 PM Eastern

Officers

Susan Wright; Director Financial Planning & IR
Jimmy Addison; CFO
Steve Byrne; SCE&G; COO

Analysts

Travis Miller; Morningstar
Stephen Byrd; Morgan Stanley
Jim von Riesenmann; Mizuho Securities
Michael Lapidès; Goldman Sachs
Mike Weinstein; UBS
Dan Jenkins; State of Wisconsin Investment Board

Presentation

Operator: Good afternoon, ladies and gentlemen. Thank you for standing by. I will be your conference facilitator today. At this time, I would like to welcome everyone to the SCANA Corporation conference call. All lines have been placed on mute to prevent any background noise. After the speaker's remarks, there will be a question-and-answer period. (Operator Instructions)

As a reminder, this conference call is being recorded on Thursday, July 30th, 2015. Anyone who does not consent to the taping may drop off the line.

At this time, I would like to turn the call over to Susan Wright, Director of Financial Planning and Investor Relations.

Susan Wright: Thank you, and welcome to our analyst call.

As you know, earlier today we announced financial results for the second quarter of 2015. Joining us on the call today are Jimmy Addison, SCANA's Chief Financial Officer, and Steve Byrne, Chief Operating Officer of SCE&G. During the call, Jimmy will provide an overview of our financial results and related matters, and Steve will provide an update on our new nuclear project.

After our comments, we will respond to your questions.

The slides and the earnings release referenced to in this call are available at scana.com.

Additionally, we post information related to our new nuclear project and other investor information directly to our website at scana.com. On SCANA's homepage, there is a yellow box containing links to the nuclear development and other investor information sections of the website.

It is possible that some of the information that we will be posting from time to time may be deemed material information that has not otherwise become public.

You can sign up for e-mail alerts under the investor relations section of scana.com to notify you when there is a new posting in the nuclear development and/or other investor information sections of the website.

Finally, before I turn the call over to Jimmy, I would like to remind you that certain statements that may be made during today's call are considered forward-looking statements and are subject to a number of risks and uncertainties as shown on slide 2. The Company does not recognize an obligation to update any forward-looking statements. Additionally, we may disclose certain non-GAAP measures during this presentation. The required Reg G information can be found in the investor relations section of our website under webcasts and presentations.

I'll now turn the call over to Jimmy.

Jimmy Addison: Thanks, Susan, and thank you all for joining us today.

I'll begin our earnings discussion on slide 3. GAAP earnings in the second quarter of 2015 were \$0.69 per share compared to \$0.68 per share in the same quarter of 2014.

The improved results in the second quarter are mainly attributable to higher electric margins due primarily to a Base Load Review Act rate increase and customer growth. These were partially offset by lower gas margins primarily due to lost gas margins of \$0.06 per share resulting from the sale of CGT, and expected increases in CapEx-related items including interest and share dilution.

Note that even though weather had no impact on earnings quarter over quarter, abnormal weather increased electric margins by \$0.06 per share in the second quarter of both 2014 and 2015.

Please turn to slide 4. Earnings per share for the six months ended June 30, 2015 were \$3.49 per share versus \$2.05 in 2014. The improved results are mainly attributable to the net of tax gains from the sales of CGT and SCI and higher electric margins due primarily to a Base Load Review Act rate increase and customer growth.

Also, O&M presented a favorable variance which is primarily attributable to CGT only operating as part of the SCANA family for one month.

These were partially offset by lower electric margins due to weather in the first quarter, lower gas margins primarily attributable to \$0.09 per share from the sale of CGT, and expected increases in CapEx-related items, including depreciation, interest, property taxes, and share dilution.

Although electric margins reflected a negative \$0.05 per share due to weather year over year, abnormal weather increased electric margins by \$0.11 per share year to date 2015, compared to \$0.16 per share in 2014.

Slide 5 shows earnings on a GAAP-adjusted, weather-normalized basis. Earnings in the second quarter of 2015 were \$0.63 per share, compared to \$0.62 per share in the same quarter of 2014.

Year to date, June earnings were \$1.97 per share in 2015, compared to \$1.89 per share from the prior year.

As a reminder, GAAP-adjusted, weather-normalized EPS excludes the impact of abnormal weather on electric margins and the net of tax gains on the sales of CGT and SCI from the first quarter of 2015.

Now on slide 6, I'd like to briefly review results for our principal lines on business. On a GAAP basis, South Carolina Electric and Gas Company's second quarter 2015 earnings were up \$0.07 compared to the same period of 2015.

Increases in earnings were due primarily to the continued recovery of financing costs through the BLRA and customer growth. These items were offset by increases in expenses related to our capital program, including interest expense, property taxes, depreciation, and share dilution. Year-to-date earnings were also higher by \$0.07 due primarily to the same drivers.

PSNC Energy's earnings for the second quarter 2015 decreased \$0.01 per share over the second quarter of 2014, primarily due to increased O&M and depreciation.

For the six-month period ended June 30, earnings were also down \$0.01 per share.

SCANA Energy, our retail natural gas marketing business in Georgia showed a decrease in second-quarter earnings of \$0.02 per share in 2015, over last year. This was primarily attributable to lower margins resulting from lower residential sales volumes during the month of April, which was warmer than in 2014.

Year-to-date earnings are \$0.15 per share compared to \$0.13 per share in the prior year.

Additionally, I am pleased to report that SCANA Energy has been approved to serve as the regulated provider for the state of Georgia through August 2017. SCANA Energy has served as a regulated provider since the program's inception in 2002.

On a GAAP basis, SCANA's corporate and other businesses reported a loss of \$0.04 per share in the second quarter of 2015, compared to a loss of \$0.01 per share in the prior year. This is mainly attributable to foregone earnings contributions from the subsidiaries that were sold during the first quarter of this year.

For the six-month period, these businesses reported earnings per share at \$1.44 in 2015, compared to \$0.08 in 2014.

Excluding the net-of-tax gains on the sales of CGT and SCI of \$1.41 per share, GAAP-adjusted EPS was down \$0.05 from the prior year.

I would now like to touch on economic trends in our service territory on slide 7.

So far in 2015, companies have announced plans to invest approximately \$750 million with the expectation of creating over 1,800 jobs in our Carolinas territories. This growth reinforces that the Carolinas continue to be seen as a favorable business environment.

At the bottom of the slide, you can see the national unemployment rate along with the rates for the three states where SCANA has a presence and the SCE&G electric territory. South Carolina's unemployment rate is now at 6.6% and the rate in SCE&G's electric territory is estimated at 6.1%. Approximately 60,000 more South Carolinians are working today than a year ago.

Slide 8 presents customer growth and electric sales statistics. On the top half of the slide is the customer growth rates for each of our regulated businesses. We continue to see accelerating customer growth in our businesses and in the region.

SCE&G's electric business added customers at a year-over-year rate of 1.6%. Our regulated gas businesses in North and South Carolina added customers at 2.7% and 3%, respectively. This is the first time any of our businesses have hit 3% growth since 2008.

The bottom table outlines our actual and weather-normalized kilowatt hour sales for the 12 months ended June 30, 2015. Overall, weather-normalized total retail sales were up 1.1% on a 12-month-ended basis.

We continue to see slightly lower weather-normalized consumption at the residential level, reflecting anticipated energy efficiencies which is offset by increases in industrial demand.

The residential consumption decline has been slightly more moderate than we anticipated, but we expect the peak summer months to continue the trend.

Now please turn to slide 9, which recaps our regulatory rate base and returns. The pie chart on the left presents the components of our regulated rate base of approximately \$9 billion. As denoted in the two shades of blue, approximately 85% of this rate base is related to the electric business.

In the block on the right, you will see that SCE&G's base electric business in which we're allowed a 10.25% return on equity. The earned return for the 12 months ended June 30 in the base electric business is approximately 9.5%, meeting our stated goal of earning a return of 9% or higher to prevent the need for non-BLRA-related base rate increases during the peak nuclear construction years.

We continue to be pleased with the execution of our strategy.

Continuing down the page, on our new nuclear business, we're allowed an 11% return on equity. I wanted to briefly mention that under the terms of our recently announced settlement agreement, if approved by the Public Service Commission of South Carolina, the allowed ROE for the new nuclear business will drop to 10.5% for all prospective requests for revised rates under the BLRA, beginning in 2016.

We have had net incremental CWIP over the last year of approximately \$547 million. And as Steve will discuss shortly, we filed our 2015 request for revised rates back in May.

Our regulated gas businesses in the Carolinas continued to perform well, and we are allowed a return of equity of 10.6% and 10.25% in North and South Carolina, respectively. And we continue to operate these businesses within a reasonable range of those returns.

Slide 10 presents our CapEx forecast. This forecast reflects new nuclear spending as reflected in the recently filed annual request for revised rates with the Public Service Commission of South Carolina, in May.

At the bottom of the slide, we recap the estimated new nuclear CWIP from July 1 through June 30, to correspond to the periods on which the BLRA rate increases are historically calculated.

Now please turn to slide 11 to review our estimated financing plan through 2017. This plan is the same as was presented last quarter. On May 19th of this year, SCE&G issued \$500 million at 50-year bonds at 5.1%.

Also, in January, we issued approximately \$14 million in equity through our 401k and DRIP plans before turning [off] the plans to new shares. By acquiring shares on the open market to satisfy the need of these plans, we can further utilize the cash proceeds from the sales of CGT and SCI.

We do not anticipate the need for further equity issuances until 2017. While these are our best estimates of incremental debt and equity issuances, it is unlikely that these issuances will occur exactly as presented, as they are subject to changes in funding needs for planned project expenses and we continue

to adjust the financing to match the related CapEx on a 50/50 debt and equity basis.

Finally, on slide 12, we are reaffirming our GAAP-adjusted, weather-normalized earnings guidance of \$3.60 to \$3.80 per share, along with our internal target of \$3.70 per share. Long-term GAAP adjusted, whether-normalized average annual growth guidance remains unchanged as we plan to deliver 3% to 6% earnings growth over the next three to five years, using a base of 2014's GAAP-adjusted weather-normalized EPS of \$3.58.

As a reminder, our projected effective tax rate for 2015, exclusive of the taxes on the gains on the sales of the subsidiaries, remains approximately 31%.

I'll now turn the call over to Steve to provide an update on our nuclear project.

Steve Byrne: Thanks, Jimmy. Please turn to slide 13. I would like to begin by again touching base on the petition that SCE&G filed with the Public Service Commission of South Carolina on March 12th of this year that is seeking approval to update the construction milestone schedule, as well as the capital cost schedule for the two new nuclear units.

The construction schedule, without consideration of all mitigating strategies, includes a [substantial] completion date of June 2019 for unit 2 and June of 2020 for unit 3.

The new capital cost schedule includes incremental capital costs that total \$698 million, of which \$539 million are associated with the delay and other contested costs.

Negotiations continue with the Consortium, and neither SCE&G nor Santee Cooper has accepted responsibility for any contested and/or delay-associated costs.

Further, we cannot predict when these negotiations will be resolved.

Our hearing with the Public Service Commission took place last week on July 21st and 22nd. The Sierra Club was the only active intervener in the hearing, and SCE&G and the Office of Regulatory Staff, or ORS, were the only parties that presented witness testimony.

The ORS, one of the parties who entered into a settlement agreement with SCE&G also presented the terms of the agreement at the hearing.

A decision by the PSC will come no later than September the 12th.

We are hopeful the PSC will approve the settlement agreement we entered into with ORS and the South Carolina Energy Users Committee related to the aforementioned petition. This settlement agreement signifies that no contested issues exist among the settling parties, and supports the approval of the revised construction and capital cost schedules.

As Jimmy's already mentioned, the settling parties also agreed to revise the allowed return on equity to 10.5% from 11% for calculating prospective revised rates sought under the BLRA on or after January 1 of 2016.

I'd now like to discuss some of the activities at the new nuclear construction site.

Slide 14 presents an aerial photo of the site from March. This photo gives you a view of the layout of the site [as well as] Units 2 and 3, as well as many other areas that make up the construction tabletop.

On slide 15, you can see an aerial photo from a different perspective. This angle shows a couple of the parking lots for the construction staff for the new units. And currently there are approximately 3,500 workers at the site.

I would like to mention also that we are having great success of hiring the permanent staff for the new units. We've already hired almost 600 of the anticipated 800 full-time positions that will be needed when the units are online.

On slide 16, you can see a picture of the unit 2 nuclear island. In this picture, you can see module CA20 along with containment vessel ring 1, which has been placed on the lower bowl.

We continue to make progress with the fabrication and placement of containment vessel structural modules.

Slide 17 presents a schematic view of the five large structural modules that are located inside of the containment vessel. This exploded view of CA01 through 05 gives you a better feel for how they fit spatially inside said containment vessel.

Slide 18 shows the lift and placement of the unit 2 module CA01, which took place on July 23rd. The 2.4 million pound CA01 houses the steam generators and the pressurizer and forms a refueling canal inside the containment vessel.

This module is the heaviest lift that will occur during the nuclear construction project.

On the top left, you can see where one of the module assembly building or MAB walls was removed in order to move the module outside for rigging to the heavy lift derrick. CA01 was then lifted and placed into the unit 2 containment vessel.

Slide 19 shows a picture of CA02, which will be the next structural module placed in the unit 2 containment vessel. All five sub modules have been assembled in the MAB, and CA02 is now structurally complete. Module CA02 is a wall section that forms part of the [in] containment refueling water storage tank.

Fabrication is nearing completion on the containment vessel rings for both units. On slide 20, you can see the fabrication of the unit 2 containment vessel top head.

Once all three containment vessel rings have been placed for unit 2, this closure head will be placed on top to seal the containment vessel.

Slide 21 shows a picture of the unit 3 nuclear island. The containment vessel lower bowl has been placed and the auxiliary building walls continue to take form.

Slide 22 shows the June 29th lift and placement of the unit 3 module CA04 into the containment vessel lower bowl. Module CA04 is a reactor vessel cavity that will house the reactor.

Please turn to slide 23. One day prior to the placement of CA04, the unit 3 reactor vessel was received on site. The unit 3 reactor vessel arrived in the Port of Charleston on June 26th, and was transported over the next two days via rail on a specially designed railcar due to the excessive weight of the component.

Once the unit 3 CA04 is fully encased in concrete, this reactor vessel, which houses the fuel assemblies,

will be lowered into it and mounted on top.

Slide 24 shows the placement of the first unit 2 shield building panels. Six of the panels, each weighing approximately 30,000 pounds and expanding 40 feet, were lifted and placed outside of the containment vessel earlier this month.

As the shield building panels are placed and welded together, concrete will be poured inside of the panels to create the shield building.

On slide 25, you will see the new nuclear CapEx, actual and projected, over the life of construction. This chart reflects our Company's current and actual estimated new nuclear CapEx during the years 2008 to 2020. It's reflected in the annual request for revised rates with the Public Service Commission.

As you can see, this year and the next several years are the peak nuclear construction period. The green line represents the related actual and projected customer rate increases under the BLRA and is associated with the right-hand axis.

Please now turn to slide 26. As you can see, we filed our BLRA quarterly status update for the first quarter of 2015 in May, as well as our annual request for revised rates under the BLRA.

The Office of Regulatory Staff has completed their review of our request and is recommending to the Commission a \$64.5 million revenue increase, or a rate increase of about 2.6%. We concur with their recommendation and anticipate the requested increase in rates effective for bills rendered on or after October 30th.

That concludes our prepared remarks. We'll now be glad to respond to any questions you might have.

Questions and Answers.

Operator: (Operator Instructions) Travis Miller at Morningstar.

Travis Miller: Was wondering if you could give a little more around your thinking on that settlement? Why come to a settlement? Why not go to the hearing? Some thoughts around the terms of the settlement. General thinking on that, if you would. Hello?

Operator: One moment. I'm sorry.

Steve Byrne: Can you hear me? Travis, can you hear me?

Travis Miller: Yes, I can. Thank you.

Steve Byrne: This is Steve, Travis. In the state, we are encouraged --

Travis Miller: You heard my question then?

Steve Byrne: I heard the question. I got the question. So we're encouraged to enter into settlement agreements. The Office of Regulatory Staff is also encouraged and likes to promote settlement agreements. And so we always try to present a settlement agreement to the Commission whenever we go in for any case.

Now, we're not always completely successful. And in this case, the Office of Regulatory Staff, ourselves,

and one of the interveners, which is the Energy Users Committee, entered into that settlement agreement.

There were a couple of interveners who did not sign on to the settlement agreement. The Sierra Club, which actively participated, and then there was one other entity that did not actively participate in the hearing, which is not unusual. There are a lot of people that sign on as interveners just to get information and they don't really participate in the process.

So from our perspective it was very positive that we entered into the agreement, and we only had one intervener against us in the hearing process. I think what the interveners got out of it was that they are concerned with rates, and by lowering the ROE, they had a small reduction in rates over the term of the construction process. And it just made it a much more positive hearing process than we've had in the past.

Travis Miller: Okay. What do you estimate that rate impact or, for you guys, the earnings impact from that 50 basis points?

Steve Byrne: Yes. We're looking at about a \$15 million reduction over about a five-year period. So that's cumulative about \$15 million.

Travis Miller: Okay. And it'll apply only to the rate base effectively that starts from 2016 on?

Steve Byrne: Correct. Correct. It's prospective.

Travis Miller: Okay. And what if you were to get that money back, that contested money? Would you then get the 50 basis points back or would there be any kind of change there?

Steve Byrne: No. The agreement is the agreement. If we were to, I think what you're talking about is if any of the contested amounts, we would come to some kind of a settlement and/or a lawsuit and we were —

Travis Miller: Yes.

Steve Byrne: -- and we were to get a refund of some description on some of those costs, we would credit those costs back to customers, but it would not impact the settlement agreement.

Travis Miller: Got it. Okay. Thanks so much. Appreciate it.

Operator: Stephen Byrd at Morgan Stanley.

Stephen Byrd: I just had one question on new nuclear. And just curious your take on China and the Sanmen Project, how that project is going, lessons learned, sort of general time frame that you understand from that, and just trying to think about that in the context of sort of paving the way for the US.

Steve Byrne: Yes, Steve. We go to China relatively frequently. We've had folks there within the last two months. So we like to try to gauge what's going on on the China projects. They have been and continue to be about 2.5 years ahead of us. Now, some of their issues are different than our issues. They actually get some issues resolved for us.

I would say that my impression now is the critical path for them really is the reactor coolant pumps, getting those installed and getting to their primary side [hydros], hot functional testing. So their pushing on those reactor coolant pumps means that they will not be an issue for us. So they'll be off our critical

path.

Our best estimate of when they will start up is probably sometime late 2016. So again, they continue to be about 2.5 years ahead of us.

Stephen Byrd: That's very helpful. And just broadly with Westinghouse and just watching what some of the issues of Mitsubishi internationally. Any further color you can provide in terms of, sounds like the issues that have occurred on cost accounting have been really more international, not really U.S.-based. But any additional color that you can add based on your conversations?

Steve Byrne: The only things that we could add - and I'm assuming you're talking about the Toshiba issues - are that we are not aware that our project is involved in any of the cost reporting improprieties.

I know that the report that was just recently translated from Japanese to English indicates that there was a project, I think they call it Project G, so they don't actually identify it, but it is a Westinghouse project. We don't believe that we are that Westinghouse project.

And I know that they had irregularities one quarter to the next. But it did point out that over the year things equaled out. So we don't anticipate any adverse actions to our project based on anything that's going on at Toshiba.

Stephen Byrd: That's helpful. Sorry. Toshiba not Mitsubishi. And Project G, was that indicated to be an American project or it was unclear in terms of how it was disclosed?

Steve Byrne: It did not indicate whether it was a U.S. project or where it was. It just said Project G.

Stephen Byrd: Understood. Okay. Great. But it sounds like, from your perspective no issues there. That's all I have. Thank you very much.

Operator: Jim von Riesemann at Mizuho Securities.

Jim von Riesemann: Question for you. If bonus depreciation goes through, what's the cash flow impact to you guys?

Jimmy Addison: It's ballpark \$75 million a year.

Jim von Riesemann: Okay. Would that help obviate the need to have to do any equity in 2017 either under the old plan or the new special petition?

Jimmy Addison: Yes.

Jim von Riesemann: Thank you. That's all I had.

Operator: (Operator Instructions) Michael Lapidès at Goldman Sachs.

Michael Lapidès: Just wanted to check in. The BLRA rate increase for November of this year, about \$64.5 million. I recall a higher number, the \$69 million or so. Was the adjustment just due to the change in ROE or were there other changes as well?

Jimmy Addison: No, nothing to do with the ROE. So the ROE change only impacts revised rate filings in 2016 and forward, not the pending one.

The difference is that we make our filing in May, but it's as of the end of June. So we have to project the spending as of the end of June, and then the ORS, when they do their work, they true it up to the actual expenditures. So it's simply just a difference in what we projected versus the actual expenditures.

Michael Lapides: And did expenditures through the middle of the year come in lighter than what you would have forecast? And do you expect that to be made up in the second half of the year or does that get pushed out to some future year?

Jimmy Addison: Yes. The first part of your question, Michael, is slightly lighter than we had forecast. But it's really not possible to answer the second part of that. It's really out of our control. That's Consortium related. So I don't know if it will all be caught up in the second half of the year or trickle over.

Michael Lapides: Okay. So there's a shot, and you'll find out in the course in coming months or so that some of the 2015 CapEx may actually get moved out to later years?

Jimmy Addison: Well, yes, it could. And that's obviously what's happened in the past. But at some point the plants are going to be finished and it's got to all catch up, right. So I just can't tell you exactly what bucket that'll fall in.

Michael Lapides: Cool. Totally different. The corporate and other costs in the quarter, I think it was \$0.04, is that kind of a good run rate to think about? And is that all just the holding company debt, the \$800 million or so, kind of the after-tax interest on that or is there something else that's in that?

Jimmy Addison: No, it's mostly the Holdco debt. And I'm not sure if the classification you've got has the other subsidiaries broken out or not, the smaller ones. But if there are other -- let me see which ones are broken out there.

Yes. So we have like the SCANA Energy marketing business is grouped in that as well. So there is some volatility between -- some cyclical nature to that business too. So you can't really take one straight run rate. So just the debt would be, of the Holdco, would be probably in the ballpark of \$0.08 or so, negative per year.

Michael Lapides: I'm just looking at slide 6. So you've got a separate line for corporate and other.

Jimmy Addison: Yes.

Michael Lapides: And so that was \$0.04 on the quarter.

Jimmy Addison: Right. But what I'm saying is in that, the Georgia business is in the line above. But the SCANA Energy marketing to the industrial customers is grouped in that line with corporate and other. And there's some cyclical nature to that piece of the business. So it's not a flat \$0.04 times four. The debt carry itself, it's probably more in the \$0.08 range per year.

Michael Lapides: Got it. Okay. Thank you.

Operator: (Operator Instructions) Julien Dumoulin-Smith at UBS.

Mike Weinstein: It's Mike Weinstein, actually. Quick question on solar. I know you guys have a plan to build about 95 megawatts by 2020, under Act 236. I'm just wondering if you can give us an update on

that and where you think solar in the state's going even beyond that act?

Jimmy Addison: Yes. We think that we're going to be on target for the build-out under that Act 236, which is going to call for roughly 45ish megawatts of utility scale solar and then another 45ish megawatts of non-utility scale solar. So that's really aimed at rooftop or community solar.

So the process is continuing. We've had a number of filings with our state public service commission relative to distributed energy resources and net metering.

We've gotten some orders out. We expect another one on [DIA] process. I think it's in -- we expect it in July or August. So it's moving.

We are continuing with our plans. We've got two solar utility scale solar that we intend to construct. Hopefully we'll make some good ground before the end of the year. One of them here at our corporate campus on the order of four megawatts, and then we've got about a 500 kilowatt system going to go in down near the Charleston area.

We do have a number of requests for interconnection to our system from solar generators. So I would imagine that we will far exceed the 90 megawatts by 2020, they just won't fall under that Act 236.

Mike Weinstein: Okay. Thank you very much.

Operator: Dan Jenkins, State of Wisconsin Investment Board.

Dan Jenkins: Had a question on page 8 where you talk about the sales and customer growth and, in particular, on the industrial sales. It looks still pretty good at 3.8, but I notice that's the 12-month number.

I was wondering if you've seen any change in the most recent quarter versus prior quarters. Is it any slower? Quicker? If you could give any color on particular industries as well.

Jimmy Addison: Yes. No, the industry distribution continues to be fairly spread out among chemicals, paper, metals. The most recent quarter is right up on top -- is right on top of the 12-month average, right at that same number, 3-3/4%.

Dan Jenkins: Okay. So you haven't seen any slowing? Because just some other utilities have said they've seen a little slowing in the industrial. But you haven't seen that in your territory?

Jimmy Addison: We haven't. We've had quite the history of industrial announcements here in the state. The governor has made it a platform of hers. And she has been very aggressive about it. And we've got several that have been announced that are yet to really put jobs on the ground.

Volvo being the most recent with expected 2,500 jobs in the next two to three years. So we've got several of those things that are still coming around from announcements one, two, three years ago.

Dan Jenkins: Okay. Then I had a couple questions just on the new nuclear build. I think I heard you say the next of the big modules to place is the CA02. Is that correct? And if so, when? Is --

Steve Byrne: Yes, Dan, that's right.

Dan Jenkins: Is that going to be a third-quarter event or later than that?

Steve Byrne: Yes, we would anticipate that'll be a third-quarter event.

Dan Jenkins: Okay. Are there any other key third-quarter items besides the CA02 in the critical path?

Steve Byrne: Well, we've placed the first of our shield building modules. And so we would hope to continue to place more shield building modules.

But really, once you get those -- the first course of the shield building has a relatively short course. And if you can see from the photographs, it's about a three-foot tall section. So we've placed a number of those sections. Now we're fitting them up and we're going to start welding on those probably within the week.

Once we get those welded, we'll be in a position to do our first concrete pour. So it'll be a short lift, because it has to be less than three feet.

And then we'll start with the taller panels. So the panels from here are going to be either eight-foot or ten-foot tall. So we've got different height panels.

But this first course was just a short course and then we'll go up vertically from there. So we'll make some progress on the shield building.

Dan Jenkins: Okay. How about for unit 3, what's kind of next in the queue for it?

Steve Byrne: Unit 3, we've got some concrete pours both outside and inside of the containment vessel. So you probably saw a release that we set the CA04 module on unit 3 earlier this year. That module is kind of a sleeve, if you will, for the reactor vessel. The concrete pours will go around that.

And you try to balance the inside containment with the outside containment concrete pours. And so we'll be coming up with those.

We continue to make progress on the walls. And we're going to be focusing some on the turbine building. We've completed the base mat pour for the turbine building. We've got some large structural steel modules that we've got assembled outside of the excavation that we'll be flying into the excavation and putting them on the concrete base mat.

So you'll see some turbine building as well as some nuclear island progress on unit 3.

We also should be finishing up on the cooling towers. Three of the four cooling towers are structurally complete, forth one's probably 25% along. So I would imagine we'll be making good headway on that last cooling tower.

Dan Jenkins: Okay. Thank you.

Operator: This concludes our question-and-answer session. I would like to turn the conference back over to Jimmy Addison for closing remarks.

Jimmy Addison: Well, thank you. In closing, we're very pleased with our midyear results as we continue to hit our plan. We continue to make large strides with our new nuclear construction and are diligently working with the regulators to obtain the approval of our new construction and cost schedules.

We thank you for joining us today and for your interest in SCANA.

Operator: The conference is now concluded. Thank you for attending today's presentation. You may now disconnect.

Crosby, Michael

From: Carter, Lonnie
Sent: Monday, November 28, 2016 1:08 PM
To: MARSH, KEVIN B (KMARSH@scana.com)
Subject: Wednesday's SCE&G/Santee Cooper meeting
Attachments: Nuclear Timelines--Project Management.docx; Nuclear Timeline-Bankruptcy.docx; Securitization Assessment Nov 28 2016.doc.docx

Kevin,

This letter is sent to assist you in preparation for our meeting on Wednesday (11/30), as both our teams prepare for the joint Board meeting scheduled on December 5. We both share the strong desire to work as a team to see the Summer 2&3 Project successfully completed. This letter is offered in that spirit:

From Santee Cooper's perspective, there are 3 primary items we need to discuss on Wednesday. Candidly, the first two have become items of frustration for Santee Cooper, and have put me in an awkward position with my Board, who are insisting to know why no action has been taken. I asked Santee Cooper's team to prepare timelines which show when the items were raised and discussed. These timelines are written from Santee Cooper's perspective, and perhaps will provide insight to your team.

1. Increased project management expertise in large scale EPC construction.
2. Bankruptcy counsel.
3. Release of the Bechtel Report to the Cooperatives.

Increased project management expertise in large scale EPC construction--We need to be prepared to discuss with our Board, after two years of requests and an affirmative commitment from you on more than one occasion, why this has not yet been done. The attached timeline is illustrative.

The formation of the CORB was SCANA's response to the Betchel Report and Santee Cooper's request for better Project oversight with large EPC experience. Based on the recommendations we heard at both CORB briefings, I am concerned that we learn critical information too late from an outside team that comes in quarterly for a few days, which should have been brought to our attention by our teams. The information we learned last week was very important and key to the effectiveness of our President's Meetings with WEC and Fluor.

As we discussed following the call, we must determine if our teams have the knowledge and expertise to glean this key information. If they do have the knowledge and expertise, then what are the reasons the information does not reach us? If they do not have the knowledge and expertise, what can be done to staff in such a manner to have this information available in a timely manner? I recommend that we move quickly to act on the CORB's recommendations and set specific timeframes for our team to implement.

Bankruptcy counsel—Bankruptcy expertise would significantly inform our team as we negotiate with WEC going forward. Our separate, collective and independent analysis suggests that the fixed price option offered by WEC is likely significantly less than the cost WEC will incur to complete the Project. This is the very reason that we selected the fixed price. Regrettably, we must anticipate WEC having financial difficulty completing the Project, particularly in a timely manner. We should consider all options available to us that will insure WEC lives up to our Agreement. Our strategies should contemplate potential bankruptcies for both WEC and Toshiba. Toshiba's weakened financial condition is an unfortunate development as WEC's guarantor that we must also consider.

After no action on our repeated requests on this topic, as indicated in the attached timeline, I asked our legal team to find bankruptcy counsel. When we advised the SCANA team of this and our recommendation, no response has been received. This issue is of such concern to the Santee Cooper Board (as the timeline shows this was brought up at our first joint Board meeting) that I further asked our legal team to conduct an assessment of the securitization of the Project in the event WEC is unable to finish. This is something that

would typically be undertaken by counsel with bankruptcy expertise. The securitization assessment is attached for your benefit. We will be prepared to discuss it further on Wednesday.

Release of the Bechtel Report to the Cooperatives—We are backed into a corner on this. Our largest customer, having learned of it through intervention in SCE&G's fixed price petition, demands a copy of the report. Our requests to your legal team to put some parameters around the disclosure has been met with the response that we should not release it. Not releasing this information will likely bring formal requests that will be an untenable position for both our companies.

We look forward to our discussion on Wednesday.

Thanks,
Lonnie

Nuclear Timeline—Additional Project Management Request

For well over two years, the Santee Cooper Board and management team have been pressing SCANA to substantially enhance the construction project management team by repeated direct requests, through the Bechtel analysis, and via the CORB process, as indicated by the timeline below.

Timeline: Project Management

- May 2014: **Roll-up Letter** - Shortly after sending the May 2014 roll-up letter to WEC receiving the \$1B EAC (Aug), Santee Cooper began discussions with SCE&G executives to engage outside assistance with management of the EPC contract.
- Sep 3, 2014: **Marsh email to Carter (September 3, 2014 at 2:06:00 PM EDT) ...**
- “We are ready to move forward with hiring/engaging an additional resource with significant construction expertise to assist us with evaluating the construction schedule and project status. I believe having this person on our staff vs. working as a consultant will avoid conflicts with the consortium on proprietary matters.”
- Feb 17, 2015: **SCANA Meeting (Timmerman’s old office)** - Marsh, Byrne, Carter, Watson, Crosby) - Santee Cooper suggests Bechtel for project review, providing SCANA with a project assessment proposal to assist in identifying areas for improvement.
- Apr 7, 2015: **Bechtel Meeting (SCANA Hangar)** - Team Marsh, Team Carter, & Bechtel – Bechtel introduces its nuclear team and presents assessment proposal. Kevin agrees to seek SCANA Board approval to go forward with an assessment.
- Apr - Aug: **SCANA and Santee Cooper Board approvals received** - to move forward with a Bechtel project assessment.
- Aug 10, 2015: **Bechtel Assessment** – finally begins. Much time lost April through July getting Roderick & Asherman engaged and NDAs and PO in place. To push forward, Santee Cooper made the Bechtel assessment a “requirement” to proceed with the (stalled) negotiations that eventually led to CB&I exiting the Project.
- Aug – Oct: **Bechtel Calls** – Craig Albert holds weekly calls with Marsh & Carter. SCANA NND project leadership has limited involvement in the assessment. Cherry steps up to lead effort on behalf of Owners. Cherry engages Archie in a daily effort to force WEC (Benjamin / Roderick) to release engineering & schedule documents. Carl Rau & Roderick eventually have a heated email exchange. Documents are finally released to a reading room only - the assessment effort is a challenge.
- Oct 22, 2015: **Bechtel Meeting (SCANA HQ)** – Bechtel executive level report-out of project assessment, findings, and high-level recommendations. Bechtel promises a final report in 2–3 weeks. SCANA management expresses hesitation, routes

assessment through legal department, indicates concern Bechtel's objective is to seek a long-term engagement on the Project.

Nov 12, 2015: **Bechtel Assessment Report – issued to George Wenick** - Weeks go by with Wenick/Bechtel wrangling over Wenick's rejection of initial report, redactions, timeline removal, critique of project management. Baxley, Pelcher, Lindsay, and Bynum meet with Wenick (in Atlanta) for a review and final disposition of report.

Feb 5, 2016: **Bechtel Project Assessment Report** – Numbered copies of final report released to Santee Cooper by SCANA.

Mar 4, 2016: **Santee Cooper Recommendations** – Five formal recommendations forwarded to Marsh:

1. Construction Milestone Payment Schedule
2. Project Evaluation and Assessment by Owners
3. Quarterly Meetings with Toshiba / WEC / Fluor
4. Evaluation of Fixed Price Option
5. Professional Oversight of EPC Agreement

Mar 7, 2016: **SCANA Meeting (Kevin's conference room)** – Marsh, Byrne, Archie, Lindsay, Bynum, Team Carter – group discusses Bechtel Report and Santee Cooper formal recommendations. Carter praises SCANA's project management team for its operations experience and ability to work well with NRC, but expresses concern over inability to hold Consortium accountable.

Marsh agrees to have the SCANA and Santee Cooper teams study the Bechtel Report, agree on actionable recommendations. Marsh agrees to add EPC resources to his team to fill any gaps/needs identified.

Marsh, Byrne & Archie float Construction Oversight Review Board (CORB) approach as a possible resource solution ... same was being used at Vogtle.

CMPS – at Santee Cooper's request, Marsh agrees to hire Bechtel (Jason Moore) on a limited scope basis to assist team in development of the CMPS. Action assigned to Archie. Archie first attempts to hire Jason Moore as an independent contractor. Subsequently, Craig Albert instructs his staff to move on.

Mar 11, 2016: **CEO Meeting (Columbia)** - Marsh, Harold Stowe, Carter, Leighton Lord – meet to discuss Santee Cooper's formal recommendations and expectations of SCANA for the planned Mar 21 Joint Board meeting.

Mar 18, 2016: **Marsh email to Carter (March 18, 2016 at 8:25:34 AM EDT)** ... pertinent excerpts provided below:

"Our team is looking forward to meeting with the Santee Board next Monday ..."

"We appreciate the effort behind the recommendations provided to us regarding your views on project issues. We have carefully considered your concerns and, as we discussed in our meeting last week, we appear to be in alignment on the first four. We agree in principle with the concern expressed in Item 5 related to additional oversight of the project and have a plan of action that we believe will address the issue appropriately. Our first step in this regard is to staff a Construction Oversight Board.

"Next we would seek an appropriate number of experienced EPC, and/or large construction project personnel to add to the new nuclear team. These individuals would be available to assist the current Project Management Office team and site leadership in assessing and addressing issues arising during construction. I am confident that the number and specific type of personnel needed in this capacity will be informed by the work of our teams who are currently summarizing a list of recommendations for the project going forward. We expect these teams to complete their work and provide a report to senior management by the end of April."

Mar 21, 2016: **Joint Board Meeting 1 (Columbia Hilton)** – discussed Bechtel Report, Santee Cooper March 3 formal recommendations and SCANAs plan forward to address issues.

Marsh committed that SCANA and Santee Cooper would work to identify actionable Bechtel recommendations, SCANA would add EPC experts to its team, and that SCANA would charter a V.C. Summer Construction Oversight Review Board to help SCANA with project execution.

Apr 7, 2016: **SCANA feedback on Bechtel Assessment** – Cherry and Crosby meet with Archie and Bynum. In response to Marsh's request for the teams to work on the Bechtel assessment recommendations, Bynum gave Santee Cooper a spreadsheet containing SCANA feedback from several members of the NND project management team. Brad Stokes (SCANA Manager of Engineering) had not been a part of the Bechtel assessment review effort, even though many issues tied to engineering were impeding progress on the Project.

Apr 15, 2016: **Santee Cooper feedback on Bechtel Assessment** – Also in response to Marsh's request for the teams to work together on the Bechtel assessment, Santee Cooper forwarded Archie and Bynum Santee Cooper's formal review of the Bechtel assessment which included a cross-reference to SCANAs feedback. Santee Cooper's feedback was consistent with its Mar 3rd recommendations calling for the addition of EPC expert resources to assist SCANA project management with executing Bechtel recommendations on engineering, procurement, project controls & scheduling.

Archie called Crosby and Byrne emailed Crosby a few days later and confirmed that they had received and reviewed Santee Cooper's feedback ... and that the teams were in agreement.

May 19, 2016: **SCANA meeting – CMPS & Bechtel Assessment** – Marsh, Byrne, Archie, Carter, Crosby, Cherry meet.

CMPS: WECs front-end loaded CMPS discussed in detail. Santee Cooper again requested SCANA seek outside expertise to assist Owners with this issue.

Bechtel Assessment: Due to the progress WEC & Fluor appear to be making on procurement issues – Santee Cooper agreed to narrow the focus of the Bechtel recommendations to only engineering issues.

Jun 17, 2016: **Santee Cooper Board Meeting (Wampee)** – Fixed Price Option formally introduced to the Santee Cooper Board. .

Jun 18, 2016: **Crosby email to Archie (June 18, 2016 10:50 AM EDT)** – Marsh, Carter and Byrne were copied ... pertinent excerpts provided.

“Yesterday, Marion brought me the attached document that you gave him Thursday on the Project Assessment Report.... SCANA's recommendation, and apparent next step, is to perform (another) 3rd party assessment on how to make things better.....I am not supportive of just another 3rd party assessment. The assessment completed Q3 2015, at a cost of \$1M, was sufficient for Santee Cooper to recognize the need to on-board experts help to work on key issues and improve the management of the Project.” No response was received.

Jun 20, 2016: **Joint Board Meeting 2 (Nexsen Pruet)**

Fixed Price Option: SCANA presents its analysis of the Fixed Price Option.

CORB: Peggy Pinnell (Santee Cooper Director) reminds Archie of his commitment in the Mar 21 joint meeting to get the CORB established as soon as possible. Archie recommits to getting the CORB established by Jul 20.

Aug 2016: **CORB Review #1** – The Construction Oversight Review Board held its first review in Jul & Aug. The initial review provided for a high-level review of the project schedule, construction, construction to startup turnover planning, engineering, startup, project management, procurement, document control, vendor supplied equipment, and component testing. An executive level exit meeting was held on Aug 18 – primary takeaways follow:

- Schedule has too many activities (238K vs 60K at Watts Bar 2)
- Subcontracts are not in schedule
- Engineering is impeding construction
- Engineering not in schedule – being handled by lists
- Project Management – must get aggressive to hold EPC accountable. Team will not make it without some help

CORB Chairman (Skaggs) promised final report in 2 weeks.

Sep 16, 2016: **Draft CORB Report #1** – received from SCANA after Carter discussed with Marsh that the report was past due. Report was in-house SCANA and being reviewed by Archie. Bynum forwarded a copy to Baxley and reminded Santee Cooper the report was confidential.

Oct 13, 2016: **SCANA action on CORB Report #1** – Williams requests an update from Archie on Oct 5. Jones forwards a report on Oct 13. The information received was primarily a report on what WEC & Fluor are doing to address CORB recommendations on schedule, engineering, project metrics, etc.

Conclusion: SCANA's project management team has many areas of strength (nuclear safety culture, operations, NRC management) but does not have the comprehensive skills and depth of experience necessary in engineering, scheduling, project controls and construction to manage a large new build project laced with complexities. Those complexities being (1) a first of a kind nuclear technology (2) being deployed by an over-extended equipment manufacturer (Westinghouse), (3) backed by an incompetent engineering firm responsible for project integration (Stone & Webster now WECTEC), and (4) a Contractor that has been disingenuous on multiple issues. The Project would be greatly benefitted by infusing the current project management team with a framework of qualified EPC managers charged with working collaboratively with the Owner and Consortium to identify areas for improvement, suggest proven solutions, and to provide an independent perspective on actual progress – the effort aimed at increasing the accountability of the Consortium and the success of the Project. After three years of project delays, and now another five months of Unit 2 delay realized in 2016 – there should be no shame in reaching out for qualified assistance.

Nuclear Timeline—Project Bankruptcy Counsel

Beginning with the precipitous decline of Toshiba's credit rating and financial strength, the Santee Cooper Board and management team have been requesting that SCANA retain bankruptcy counsel for the project. The following timeline is illustrative:

Timeline: Bankruptcy Counsel

April 2015: Toshiba announces accounting scandal.

July 21, 2015: Toshiba senior executives and Board of Directors resign.

Dec 22, 2015: Moody's reduces Toshiba long term bond rating to junk status.

Mar 2016: Santee Cooper approaches Nelson Mullins bankruptcy counsel about Project, conflicts check shows WEC is a client of Nelson Mullins in some capacity.

Mar 21, 2016: **Joint Board Meeting 1 (Columbia Hilton)** – Boards discussed declining financial condition of Toshiba and what financial response the Owners should make to poor project progress. Owners' counsel met with George Wenick that afternoon and Santee Cooper requested that bankruptcy counsel be retained for the Project as a proactive measure given Toshiba's and potentially WEC's financial condition.

Apr 4, 2016: **Pelcher email to Bynum (April 4, 2016 4:01 PM EDT)** – pertinent excerpt

"... has SCE&G secured a project bankruptcy attorney to help us think through how Toshiba's financial difficulties might impact Westinghouse and ultimately us? You may recall this is a topic we discussed during our Mar 21 (post board meeting) nuclear attorneys meeting ..."

Jun 7, 2016: **Crosby email to Byrne (June 07, 2016 6:03 PM EDT)** – pertinent excerpts

"... Lonnie asked me to forward you and Kevin a proposed agenda for the joint meeting on the 20th. Here is what I have so far ... welcome your comments.

1. Fixed Price Option

- a. SCANA analysis – presentation
- b. PSC Testimony – any comments that can be shared
- c. Draft SCANA letter to Santee Cooper – recommending FPO
- d. Potential Bankruptcy – outside legal opinion & plan to address"

Jun 16, 2016: **Marsh email to Carter (June 16, 2016, at 3:39 PM)** – pertinent excerpts

"Based on our internal discussions, we propose an agenda as follows:

1. Follow-up on issues from our last joint meeting;
2. Consideration of the fixed price option; and
3. Update on the milestone schedule/Dispute Resolution Board (DRB) issue"

"Through a number of emails I have seen other topics that your board may want to discuss. We are prepared to do that, but we believe that such a discussion should occur when we have more time. Issues, such as the potential bankruptcy of Toshiba or Westinghouse are critical, but would prefer to have some detailed discussions and debate within our project teams before making a formal presentation to either of our boards."

Jun 16, 2016: **Carter email to Marsh (Jun 16, 2016, 7:20 PM)** – pertinent excerpts

"... Finally, I agree with you that further staff level discussion on the ramifications of a Toshiba or Westinghouse bankruptcy would be useful and should precede any formal presentations to our boards on this matter. With that said, the possibility of such a bankruptcy cannot be entirely divorced from our joint board discussions on Monday. For example, Item No. 2 on your agenda relating to the fixed price option obviously shifts risk away from the Owners and to Toshiba/Westinghouse, making their credit worthiness all the more important. Similarly, with respect to Item No. 3, getting the milestone payment schedule right will make it less likely that Westinghouse view as desirable a strategic Chapter 11 bankruptcy to rid itself of uneconomical executory contract."

Jun 17, 2016: **Carter email to Marsh (June 17, 2016 5:12 PM)** – pertinent excerpts

"At today's Santee Cooper Board meeting several questions regarding the implications of a Toshiba bankruptcy came up. Some we could address others not. I would anticipate similar questions Monday....."

Jun 23, 2016: **Pelcher email to Bynum (June 23, 2016, at 5:12 PM)** – pertinent excerpts

"... At one of my notes from Monday's Joint SCANA/Santee Cooper Board Meeting in Columbia was an interest by members of the respective boards in retaining project bankruptcy counsel to provide strategic advice on the challenges associated with Toshiba's financial difficulties arising out of last year's accounting scandal and the risk that posed to the Owners and the project."

"As I understood the discussion from Monday, our joint boards had an interest in retaining as project counsel someone who would be able to represent us both now and in the event of a bankruptcy without having to get a waiver from Westinghouse or Toshiba. My notes indicate that you tasked George Weniek to identify potential project bankruptcy counsel for this purpose."

"One more thing - - and just speaking for myself - - in the penultimate paragraph of his June 16, 2016, at 3:39 PM Email, below, Kevin Marsh advanced the idea of

possibly making a “formal presentation” to our boards on the bankruptcy/insolvency issue after some further analysis/discussion among staffs of SCE&G and Santee Cooper. Given the demonstrated interest in this issue by our board, I think this is a very good idea.”

“I would think that the content of such a board presentation would be informed not only by the analysis of the project bankruptcy attorney we eventually (hopefully very soon) retain, but also by a more granular understanding of Toshiba’s and Westinghouse’s financial situation. Although as a Japanese company the particulars of Toshiba’s financial situation might be a bit opaque to us over here, I would think that there would be resources availability to allow us to develop a better picture of its situation and prospects.”

Jun 24, 2016: **Bynum email to Pelcher (June 24, 2016 1:53 PM)** – pertinent excerpt

“Ron and I talked to George yesterday about adding bankruptcy support. He is looking for candidates. We are likely comfortable with whoever he suggests”

Jun 30, 2016: **Pelcher email to Bynum (June 30, 2016 11:41 AM)** – pertinent excerpt

Al: Following Up on our Email Exchange of late last week on bankruptcy counsel, and anticipating that this issue might be raised by one of our board members in connection with today’s meeting, has any progress been made in securing project bankruptcy counsel? As you may remember, the issue of WEC/Toshiba bankruptcy/insolvency was on the mind of several of our board members during the June 20th Joint Meeting.”

Jun 30, 2016: **Bynum email to Pelcher (June 30, 2016 2:59 PM)** – pertinent excerpt

“George will have to answer your bankruptcy question – we delegated that to him”

Aug 19, 2016: **Pelcher email to Bynum (August 19, 2016 8:43 AM)** – pertinent excerpt

“Al: As you may know, the Santee Cooper meeting on Monday, August 22nd. There will be the now normal update on V.C. Summer Units 2 and 3 in Executive Session. I will be on hand to answer questions of a legal variety that may arrive. “

“QUESTION: If asked by a board member in Executive Session about the status of securing project bankruptcy counsel, what should I tell them?”

Sep 28, 2016: **Pelcher email to Wenick / Bynum (September 28, 2016 2:20 PM)** – pertinent excerpts

"George/Al: I was on the Executive Floor today and a question came up about whether George has made any progress in identifying a project bankruptcy counsel? You may recall, that this is a matter that our joint boards discussed during their June 20th meeting. I have pasted below for your convenience prior Email on this matter."

"The next Santee Cooper Board meeting is scheduled for October 14th and I anticipate this issue coming up at that time."

Oct 24, 2016 **Carter and Baxley travel to New York and meet with Dentons, LLC attorneys regarding project bankruptcy counsel.**

Oct 25, 2016 **Carter letter to Marsh:**

During the June 20 joint meeting, members of both our Boards expressed concern about the financial difficulties being faced by Toshiba Corporation and Westinghouse Electric Company and how those problems could possibly impact the timely and successful completion of the project. One action item that SCANA agreed to take on was securing Project Bankruptcy Counsel who would help us think through Toshiba/Westinghouse insolvency scenarios so that we might begin planning now on how mitigate the impact of such an unfortunate possibility. Indeed, in a June 16, 2016 email to me, you expressed the very same concerns describing "the potential bankruptcy of Toshiba or Westinghouse [as] critical" but expressing the "prefer[ence] to have some detailed discussions and debate within our project teams before making a formal presentation to either of our Boards." The time for that formal presentation to the Board has arrived.

Oct 28, 2016 **Email from Baxley to Marsh and SCANA legal team:**

I'm pleased to report that this week we have located bankruptcy counsel for the nuclear construction project. Stuart Caplan of Dentons New York office has assembled an energy/large construction group with whom we met this week. Stu is well known to Santee Cooper and has represented us in multiple issues over three decades. He is assisted by Farrington Yates who focuses on large scale construction bankruptcies representing creditors. The third member of the team is a large construction project risk avoidance specialist who has litigated the aftermath of multiple mega projects and personally knows at least one of our DRB—John Hinchey—and made several accurate observations about his personality.

No reply received from any recipient.

Confidential/Proprietary/Attorney Work Product

EPC Securitization Assessment

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Respectfully Submitted,

Nuclear Project Securitization Team

J. Michael Baxley
Michael R. Crosby
Elizabeth H. Warner
Stephen R. Pelcher
Rahul Dembla

November 28, 2016

Action Item 5

**PUBLIC SERVICE COMMISSION OF SOUTH CAROLINA
COMMISSION DIRECTIVE**

ADMINISTRATIVE MATTER	<input type="checkbox"/>	DATE	<u>September 02, 2015</u>
MOTOR CARRIER MATTER	<input type="checkbox"/>	DOCKET NO.	<u>2015-103-E</u>
UTILITIES MATTER	<input checked="" type="checkbox"/>	ORDER NO.	_____

SUBJECT:

DOCKET NO. 2015-103-E - Petition of South Carolina Electric & Gas Company for Updates and Revisions to the Capital Cost Schedule and Schedules Related to the Construction of a Nuclear Base Load Generation Facility at Jenkinsville, South Carolina - Staff Presents for Commission Consideration South Carolina Electric & Gas Company's Petition for Updates and Revisions to the Capital Cost Schedule and Schedules Related to the Construction of a Nuclear Base Load Generation Facility at Jenkinsville, South Carolina.

COMMISSION ACTION:

This matter comes before us on the request of South Carolina Electric & Gas Company (SCE&G) for approval of requested modifications and revisions to the currently approved capital cost schedule and construction schedule for the new V.C. Summer Units 2 and 3. The proposed cost updates fall into a number of categories but constitute the following total amounts in 2007 dollars:

1. Total EPC Cost Adjustment: \$453.1 million
2. Total Owner's Cost Adjustment: \$245.1 million

The proposed cost updates total approximately \$698.2 million in 2007 dollars, and the bulk of the updates appear to be attributable to both contractor delay and to proposed additional Owner's Cost. With regard to the proposed modifications and revisions to the construction schedule, the updates reflect a delay in substantial completion of Unit 2 until June 19, 2019 and Unit 3 until June 16, 2020.

I would note that ORS filed a Settlement Agreement with this Commission, which was executed by ORS, SCE&G, and the South Carolina Energy Users Committee (SCEUC). Of the remaining parties, the Sierra Club and CMC Steel South Carolina did not sign the Settlement Agreement. CMC Steel, however, later indicated that it did not object to the terms of the Settlement Agreement. Among other things, the Settling Parties agreed that the modified construction schedule and capital cost schedule presented in the Company's Petition were not the result of imprudence by SCE&G and agreed that the Commission should approve the updated construction schedule and capital cost schedule attached to the Petition. The Settling Parties also agreed that the two proposed schedules were fully consistent with the requirements of the Base Load Review Act. Under the statutory structure of South Carolina Code Annotated Section 58-33-270 (G), both ORS and SCE&G are signatories to the Settlement Agreement. More than sufficient opportunity for factual review and for discovery has been given. Within this context, and under this statute, the Commission's task is to review the evidence of record presented by the utility and ORS to see that this evidence supports the Settlement Agreement and the terms it encompasses. I have reviewed the evidence, and have concluded that it supports the Settlement Agreement and its terms. Further, I believe that the terms of the Settlement Agreement comport with the terms of the Base Load Review Act. Accordingly, I move that this Commission approve the Settlement Agreement, and accept it as disposing of all issues in this case.

However, in approving the Settlement Agreement, I would note that this Commission is holding that SCE&G's decision to pay at least 90% of certain disputed invoiced amounts under the EPC Contract is reasonable and in accordance with the Contract, and that including those payments in the anticipated

cost schedule for this project is appropriate under the Base Load Review Act. Whereas, I do endorse that holding for inclusion in the merits Order, I also move that we encourage SCE&G to take all necessary steps to collect appropriate disputed amounts from contractors, so that the Company's ratepayers' additional expenses due to contractor-induced delay and other causes may be minimized, and reimbursed to the Company's customers where possible. Also, I move that we encourage SCE&G to take all actions available to insure that it qualifies for production tax credits.

PRESIDING: Hall

SESSION: Regular

TIME: 2:00 p.m.

	MOTION	YES	NO	OTHER
ELAM	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
FLEMING	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
HALL	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
HAMILTON	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
HOWARD	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
RANDALL	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
WHITFIELD	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	

(SEAL)



RECORDED BY: J. Schmieding

BEFORE
THE PUBLIC SERVICE COMMISSION OF
SOUTH CAROLINA
DOCKET NO. 2015-103-E - ORDER NO. 2015-661
SEPTEMBER 10, 2015

IN RE:	Petition of South Carolina Electric & Gas Company for Updates and Revisions to Schedules Related to the Construction of a Nuclear Base Load Generation Facility at Jenkinsville, South Carolina)	TABLE OF CONTENTS
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Crosby, Michael

From: Crosby, Michael
Sent: Wednesday, October 14, 2015 1:12 PM
To: Carter, Lonnie
Cc: cwrau@bechtel.com
Subject: *** Confidential *** Bechtel Assessment (Preliminary - Bullet Notes)

Lonnie,

Carl has provided (you/me) preliminary bullet notes from the Assessment (see below) ... **SCE&G has not seen this yet.**

I do not see any real surprises ... the **Bechtel projection on commercial operation dates is sobering.**

Once a CEO meeting is scheduled ... Carl will work to schedule a sit-down meeting with Byrne & me ... and also a separate meeting with Jeff Archie's staff ... but he needs to get you and Kevin nailed down first.

Per Carl ... **the CEO meeting is looking like the 22nd or 23rd** ... Marty told me your schedule was better on the 23rd.

Thanks,
Michael

From: Rau, Carl [mailto:cwrau@Bechtel.com]
Sent: Tuesday, October 13, 2015 3:55 PM
To: Crosby, Michael
Subject: [EXTERNAL SENDER] Bechtel Assessment

Michael,

The attached is hot off the press, Preliminary Assessment, which will form the basis of our presentation to the execs. I did not include recommendations as they are still in development but will be part of the exec review.

Call with questions,

Carl

Scope of the Assessment

- Evaluate the status of the project to assess the Consortium's ability to complete the project on the forecasted schedule.
- Focus was not on cost.
- Team comprised of 10 senior managers from the following functional areas – Project Management, Construction, Project Controls, Engineering & Licensing, Procurement, and Startup.

Preliminary Findings

Project Management

- The project management approach used by the Consortium does not provide appropriate visibility and accuracy on project progress and performance.
- There is a lack of accountability in various departments in both the Owner's and Consortium's organizations.
- The Consortium's lack of project management integration (e.g., resolution of constructability issues) is a significant reason for the current construction installation issues and project schedule delays.
- The current hands-off approach taken by the Owners towards management of the Consortium does not allow for real-time, appropriate cost and schedule mitigation.
- The WEC-CB&I relationship is extremely poor caused to a large extent by commercial issues.
- The overall morale on the project is low.

Project Controls

- Our preliminary assessment of the project schedule is that the commercial operation dates will be extended:
 - Unit 2: 18-26 months beyond the current June 2019 commercial operation date,
 - Unit 3: 24-32 months beyond the current June 2020 commercial operation date.

The probability range is approximately 50%-75%.
- The Consortium's forecasts for schedule durations, productivity, forecasted manpower peaks, and percent complete are unrealistic.
- The Owners do not have an appropriate project controls team to assess/validate Consortium reported progress and performance.

Construction

- Construction productivity is poor: Unit 2 is 2.3, Unit 3 is 1.6.
- Manual and non-manual sustained overtime is negatively affecting productivity.
- CB&I's work planning procedures are overly complex and inefficient, directly affecting craft productivity.
- Aging of the construction workforce is impacting productivity.
- The indirect to direct ratio is very high at 157% (typical mega nuclear project is 35-40%).
- Field non-manual turnover is high at 17.4% per annum.
- The current construction percent complete per month is only 0.5% versus plan of 1.3%.
- The workable backlog is significantly more than the current craft workforce.
- The project safety, housekeeping, and quality records are very good.

Engineering and Licensing

- Based on the team's observation of current civil work, the issued design is often not constructible (currently averaging over 600 changes per month). The complexity of the engineering design has resulted in a significant number of changes to make the design constructible.
- The construction planning and constructability review efforts are not far enough out in front of the construction effort to minimize impacts.

- Resolution of many Engineering and Design Coordination Reports (E&DCRs) is behind schedule. The E&DCR backlog is not decreasing.
- Engineering staffing remains extremely high for this stage of the project (around 800 total engineers for WEC and CB&I); however, the staffing is needed to complete the design and provide support to construction.
- There is significant engineering and licensing workload remaining for electrical design, I&C, post construction design completion, ITAAC closure, etc. Much of this remaining engineering will potentially impact construction.
- 119 license amendment requests (LARs) and 657 departures have been identified to date. This is a significant project workload that is well planned and scheduled and interactions with the NRC are good. Emergent issues potentially requiring NRC approval of LARs remain a significant project concern.

Procurement

- There is a significant disconnect between Construction need dates and procurement delivery dates. There are:
 - 457 open WEC and 2,907 open CB&I equipment deliveries.
 - 31 WEC and 28 CB&I POs to be placed.
- The amount of stored material onsite is significant creating the need for an extended storage and maintenance program. Inventory validation in the yard is only at 48% accuracy.
- The current min-max warehousing program is insufficient for the scale of the construction effort which is impacting productivity.

Startup

- The startup test program schedule is in the early stages of development.
- The current boundary identification package turnover rate appears to be overly aggressive and not consistent with the current construction completion schedule.

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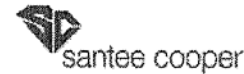
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Special Called Meeting of the Board of Directors - Cover Letter



INTER-OFFICE COMMUNICATION

Date: October 21, 2015
 To: Board of Directors
 From: Mr. Lonnie N. Carter, President and Chief Executive Officer *LNC*
 Subject: Confidential New Nuclear Construction

We are nearing the end of a difficult process in attempting to realign the nuclear construction project. All parties have been aware that the project was in trouble, and for some time Westinghouse CEO Danny Roderick has been telling us he has been working on a solution. We now know that the proposal involves removing CB&I from the Project as a party of the EPC (Consortium) and replacing that entity with Fluor in a role as subcontractor. In the process, we were able to obtain an additional offer of an option to fix the price on the overall contract, with the intent to reduce our exposure for future delays and potential cost overruns.

Throughout our negotiations, Santee Cooper's top priority has been getting the project on a credible and maintainable schedule, with future payment for work tied to that schedule. For SCANA, the top priority has been fixing the price, and doing so at a level they could convince the PSC to approve. It's fair to say each team has fully supported the other's goal, but at times internal discussions have been contentious as we have attempted to synchronize our approach to Westinghouse.


We have now reached the point where the die is cast. The announcement of Southern's earnings call for October 28, SCANA's for the following day, and CB&I's for November 5 puts us all in a position of having to accept or reject the new amended agreement. I can say to you without reservation that the Santee Cooper management team believes we have worked out the best deal possible under the circumstances. We have substantially improved our position going forward, and we now have the benefit of an additional year to assess the project's progress to determine whether to elect the fixed price option.

For your support as you evaluate this decision and working with Chairman Lord and Director Ray, we have retained independent legal counsel solely for the Board through Dentons US LLP. Attorneys G. Scott Rafshoon and Charles R. Vantine, who have experience in major construction project contract negotiations, will be present at Friday's Board meeting and available for private discussions with you. Attorneys George Wenick and Frank Elmore, who have been assisting throughout the nuclear project, will also be present. Michael Crosby, Mike Baxley, and I are available to meet with you personally at any time to discuss this matter and answer questions.

Attached to this letter are the documents that comprise the new agreement. The Santee Cooper team is grateful for your consideration of these materials and guidance on this pivotal matter. Thank you for your leadership to our company. Please call me if you have questions or concerns.

LNC:alh

EXHIBIT 9
Page 1 of 31

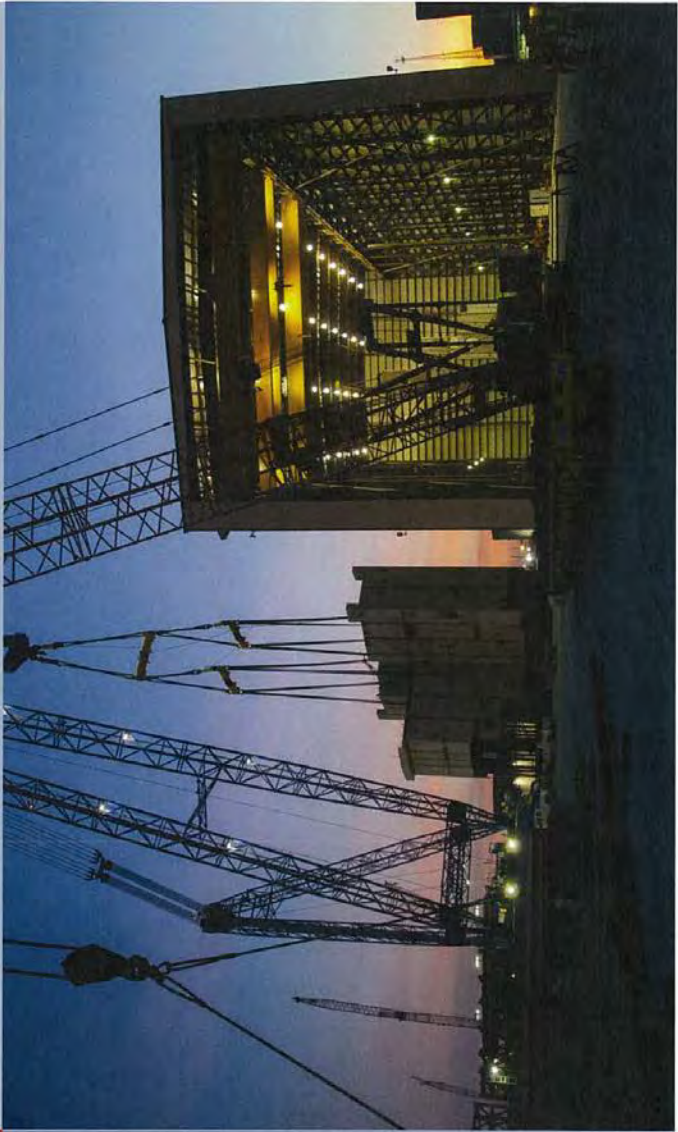


INFRASTRUCTURE
MINING & METALS
NUCLEAR, SECURITY & ENVIRONMENTAL
OIL, GAS & CHEMICALS

DRAFT

V.C. Summer Nuclear Generating Station Units 2 & 3 Preliminary Results of Bechtel Assessment

October 22, 2015 Presentation to SCE&G and Santee Cooper



Strictly Confidential to
SCE&G and SCP&A

EXHIBIT 9
Page 2 of 31

Agenda

- Overview
- Introduction
- Assessment Timeline
- Assessment Scope
- Bechtel Assessment Team
- Project Management
- Engineering & Licensing
- Procurement
- Construction
- Start-Up
- Project Controls
 - Schedule Assessment
- Preliminary Conclusions

DRAFT

Strictly Confidential to SCE&G and SCP&SA | 2

Preliminary Results of Bechtel Assessment



EXHIBIT 9
Page 3 of 31

Overview

DRAFT

- The objective of the assessment was to assist the Owners to better understand the current status and potential challenges of the project and to help ensure the project is on the most cost efficient trajectory to completion.
- Based on our assessment, the current schedule is at risk. Significant issues include:
 - To-go scope quantities, installation rates, productivity, and staffing levels all point to completion later than current forecast.
 - While EPC plans and schedules are integrated; the plans and schedules are not reflective of actual project circumstances.
 - The Consortium lacks project management integration needed for EPC.
 - There is a lack of a shared vision, goals, and accountability between the Owners and the Consortium.
 - The WEC-CB&I relationship is extremely poor, caused to a large extent by commercial issues.
 - The Contract does not appear to be serving the Owners or the Consortium particularly well.
 - The issued design is often not constructible resulting in a significant number of changes.
- The oversight approach taken by the Owners does not allow for real-time, appropriate cost and schedule mitigation.

Sinclair Confidential to Bechtel, SCE&G, and SCPSCA | 3



EXHIBIT 9
Page 4 of 31

Introduction

DRAFT

- The assessment was performed in accordance with an August 6, 2015 Professional Services Agreement between Bechtel Power Corporation and Smith, Currie & Hancock LLP (SCH) for the purpose of assisting SCH in giving legal advice.
- The objective of the assessment was to assist SCH and the Owners (South Carolina Electric & Gas Company and South Carolina Public Service Authority) to better understand the current status and potential challenges of the project in anticipation of litigation and also to help ensure the project is on the most cost efficient trajectory to completion.
- Bechtel's team evaluated the current status and forecasted completion plan through the design, supply chain, and construction aspects of the project.
 - Focus was on understanding the issues that have caused impacts to date, assessing the effectiveness of the mitigation plans put into place to address those issues, and reviewing the project management tools and work processes being employed to plan and execute the project, including change management, through completion and turnover of the units.
- Materials received, collected or prepared by Bechtel in connection with the assessment are the property of the Owners and shall be treated as confidential.

EXHIBIT 9
Page 5 of 31

Assessment Timeline

DRAFT

- Schedule:
 - Issue draft report 7 weeks following site mobilization for Owners' review.
- The assessment included:
 - Data validation
 - Site walkdowns
 - Leadership team interviews
 - Functional breakout sessions
 - Preparation of report
- Key dates:
 - August 14: Initial documents received from Consortium
 - August 19: Portions of Integrated Project Schedule received
 - September 8: Bechtel Team mobilized to site
 - September 9: Consortium presentation to Bechtel Team
 - October 22: Bechtel presentation to SCE&G and Santee Cooper

EXHIBIT 9
Page 6 of 31

Assessment Scope















DRAFT

- During the assessment period, the Bechtel team:
 - Reviewed 353 Consortium and Owner documents.
 - Attended 70 meetings with Consortium and Owner personnel.
 - Conducted 35 interviews of Consortium and Owner personnel.
 - Completed 24 site walkdowns/real-time observations.
 - Attended 7 subject-specific presentations.
- Bechtel's assessment is based on the data, schedule, and other information obtained from the Consortium and the Owners:
 - Construction bulk quantities were obtained from the Consortium (various questions on these quantities were identified).
 - Some data and information was provided electronically by the Owners and the Consortium. For the majority of data and information, a single hard copy was placed in a Reading Room at the site and no additional copies could be made. This limited our ability to fully assess the information [e.g., engineering schedules, ROYG (red-orange-yellow-green) report, etc.]
 - Many documents were redacted.
- Only key observations are identified in this presentation. Additional observations will be included in the final report.

EXHIBIT 9
Page 7 of 31

Bechtel Assessment Team

DRAFT

		Carl Rau Executive Sponsor	Dick Miller Assessment Team Leader
		Ty Troutman Principal Vice President Assessment Reviewer	John Atwell Principal Vice President Assessment Reviewer
		George Spindle Construction	Mike Robinson Construction
		Ed Sherow Engineering and Licensing	Ron Beck Engineering and Construction
		Steve Routh Engineering and Licensing	Bob Exton Procurement & Contracts
		Jason Moore Project Controls	Jonathan Burstein Project Controls
		Bob Pedigo Startup	Jerry Pettis Project Administration

- 14 senior managers supported by Bechtel functional departments
- Over 500 years of total experience
- Over 300 years of EPC nuclear experience
- Experience on over 85 EPC projects

Strictly Confidential to SCE&G and SCPSA | 7

Preliminary Results of Bechtel Assessment



EXHIBIT 9
Page 8 of 31

Project Management Key Observations and Recommendations

DRAFT

- The Consortium's project management approach does not provide appropriate visibility and accuracy to the Owners on project progress and performance.
- There is a lack of accountability in various Owner and Consortium departments.
- The Consortium's lack of project management integration (e.g., resolution of EPC issues) is a significant reason for the current construction installation issues and project schedule delays.
- The approach taken by the Owners does not allow for real-time, appropriate cost and schedule mitigation.

Recommendation:

- » Owner: Develop an Owners' Project Management Organization and staff it with EPC-experienced personnel who are empowered with the roles, responsibilities, and accountabilities for making the needed project-related decisions to keep the project on track.
- » Consortium: Assign recognized high-performing personnel to the current Consortium management personnel (i.e., shadow positions) as part of a major improvement plan.

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Project Management

Key Observations and Recommendations (cont'd)

DRAFT

- The WEC-CB&I relationship is extremely poor, caused to a large extent by commercial issues.

Recommendation: The Owners should take an active role in determining the reason(s) for the relationship and develop an action plan, including possible new contract terms, to fix the relationship.

- The overall morale on the project is low.

Recommendation:

- » The Project needs to experience some successes, no matter how small. Publish and post scheduled activities for the coming months around the job site. Post activities that have a high likelihood of being completed within schedule. Reward those responsible for achieving success (i.e., make success contagious).
- » Recognize individuals for their contributions to the project. For example, have an employee of the month from the various functions/various craft trades and publicly reward them. Rewards could include preferred parking for a month, gift certificates, etc.

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Project Management

DRAFT

Key Observations and Recommendations (cont'd)

- It appears that the Contract has created an imbalance between the Owners and the Consortium. The Consortium does not appear to be commercially motivated to meet Owner goals.
- WEC Engineering has not been completely responsive to Procurement and Construction requests for clarification and changes (e.g., timeliness, constructible designs); this is believed to be caused mostly by the commercial situation (i.e., WEC fixed price engineering).
- The Consortium's commercial structure, while not shared, is outwardly affecting the day-to-day working relationships between the Consortium partners and is creating performance issues, including significant non-manual turnover.

Recommendation:

- » Align commercial conditions with the project goals.
- » Facilitate Owner and Consortium teambuilding. If necessary, replace personnel with others that share the goals developed by the project.
- » Determine the realistic to-go forecast costs for the project.

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Engineering & Licensing Key Observations and Recommendations

DRAFT

- Based on the team's observation of current civil work, the issued design is often not constructible (currently averaging over 600 changes per month). The complexity of the engineering design has resulted in a significant number of changes to make the design constructible.

Recommendation:

- » Locate dedicated WEC engineering response teams to the site with design authority to resolve current Engineering & Design Coordination Reports (E&DCR) problems.
- » Establish a WEC/CB&I "Light Structures" design organization at the site to work with construction to redesign and reissue piping, HVAC, conduit, and tray supports.

- The construction planning and constructability review efforts are not far enough out in front of the construction effort to minimize impacts.

Recommendation: Intensify efforts of Strategic Planning Group, work package planning, constructability reviews, etc. to early identify design changes needed.

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Engineering & Licensing Key Observations and Recommendations (cont'd)

DRAFT

- Resolution of many E&DCRs is behind schedule. The E&DCR backlog is not decreasing.

Recommendation: Provide additional staffing to address emergent E&DCRs and work off current backlog. Locate more appropriate resources to the site to address early any emergent E&DCRs.

- Engineering staffing remains extremely high (around 800 total engineers for WEC and CB&I) for the reported percent complete of the design; however, it appears that the staffing is needed to complete the design and provide support to construction.

Recommendation:

- » Allocate dedicated resources to complete and issue the remaining design on or ahead of current schedule which is ≈ the end of 2016.
- » Plan to reduce engineering headcount and aggressively monitor.

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Engineering & Licensing Key Observations and Recommendations (cont'd)

DRAFT

- There is significant engineering and licensing workload remaining for electrical design, I&C, Post-Design Engineering Closure Plan, ITAAC closure, etc. Much of this remaining engineering will potentially impact construction.

Recommendation:

- » Allocate dedicated resources to complete and issue the remaining design on or ahead of the current schedule which is approximately the end of 2016.
- » Convene a group of SMEs and commit to completing the scoping, resource loading, and scheduling of Post-Design Engineering Closure Plan work by no later than 1Q2016.

- 119 license amendment requests (LARs) and 657 departures have been identified to date. This is a significant project workload that appears to be well planned and scheduled. Interactions with the NRC are good with a focus on meeting construction need dates (CNDs). Emergent issues potentially requiring NRC approval of LARs remain a significant project concern.

Recommendation: Continue planning and scheduling efforts for LARs and departures and active interactions with NRC to meet CNDs. Intensify efforts of Strategic Planning Group, work package planning, constructability reviews, etc. to emphasize early identification of potential departures.

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Procurement

Key Observations and Recommendations

- There is a significant disconnect between construction need dates and procurement delivery dates. There are:
 - 457 open WEC and 2,907 open CB&I equipment deliveries.
 - 31 WEC and 28 CB&I Standard Plant POs to be placed.
- The ROYG (red-orange-yellow-green) report is described as inaccurate.

Recommendation:

- » The Consortium should complete their schedule adherence effort by 10/31/15 so that mitigation plans can be implemented, resulting in the ROYG report properly addressing CNDs, PO awards, and supplier deliveries.
- » Assess resource needs to properly manage this activity.
- The amount of stored material onsite is significant, creating the need for an extended storage and maintenance program. Inventory validation in the yard is reported to be only at 48% accuracy.

Recommendation: Investigate and determine if component and material deliveries can be delayed for shipment (i.e., delay fabrication and delivery to minimize onsite storage durations) in order to minimize the need to perform extended period PM and storage actions on site. Implement every opportunity to minimize onsite storage duration after initial delivery.

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Procurement

Key Observations and Recommendations (cont'd)

DRAFT

- The current Min/Max warehousing program is insufficient for the scale of the construction effort, which is impacting productivity.

Recommendation:

- » Expedite the finalization of the Min/Max strategy and implementation of the identified Blanket Purchase Orders (BPOs) so that construction can use them, versus writing individual material requisitions.
- » In reviewing the report of BPOs in place that would support a Min/Max system, there must be further discussion with construction and field engineering as to what products should be maintained within the Min/Max system.
- » Educate site personnel on the use and process of the BPOs and the Min/Max system. It was evident that material was ordered versus use of Min/Max – BPOs.

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Construction Key Observations and Recommendations

DRAFT

- Construction productivity is poor: Unit 2 is 2.3, Unit 3 is 1.6.

Recommendation:

- » Achieve more timely resolution of engineering issues.
- » Assemble a team of subject matter experts to review proposed resolutions.
- » Re-assess tolerances and repair procedures to give construction more latitude in resolving issues.
- » Simplify the work packaging process (see next slide).
- » Efforts need to be made to keep the craft at the workforce (have coffee breaks and lunch at their place of work).

- Manual and non-manual sustained overtime is negatively affecting productivity.

Recommendation:

- » The work week should be reduced to no more than 48 hours (four 10 hour days, one 8 hour day). Spot overtime beyond 48 hours should be kept to a minimum.
- » Consider craft incentive plan.

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Construction

DRAFT

Key Observations and Recommendations (cont'd)

- CB&I's work packaging procedures are overly complex and inefficient, directly affecting craft productivity.
 - Recommendation:**
 - » Simplify the process.
 - » Reduce the scope of the package.
 - » Limit the foreman's package to only the information needed.
 - » Incorporate changes into the design drawings before work begins.
- Aging of the construction workforce is impacting productivity.

Recommendation:

- » Develop mentoring and training plan to promote junior craft and field engineering personnel with periodic evaluations and feedback sessions.
- » Create and staff shadow positions for senior level positions within the Consortium intent on developing new talent that is focused on project completion.

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Construction

DRAFT

Key Observations and Recommendations (cont'd)

- The indirect to direct craft ratio (1,100 persons to 800 persons) is very high at 130% (typical mega-project is 35 to 40%).

Recommendation: Develop a plan to identify targeted reductions to reduce the indirect ratio to a reasonable level and monitor it weekly.

- Field non-manual turnover is high at 17.4% per annum.

Recommendation: Perform evaluation of high turnover rate to correct the problem.

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Construction

DRAFT

Key Observations and Recommendations (cont'd)

- The workable backlog can support significantly more than the current craft workforce. The current construction percent complete per month is only 0.5%.

Recommendation:

- » Staff up to work available areas.
- » Increase the amount of time the craft are at the workplace. Perform time and motion study.
- » Consider combining the Unit 2 and 3 Nuclear Island teams to reduce non-manual staffing and allow flexibility when issues are encountered.
- » Use the onsite training facility and local vocational schools to train more crafts that can't be recruited (rebar ironworkers now; pipefitters and electricians in the future).

- The project safety, housekeeping, and quality records are very good.

Recommendation: Keep up the good work! Consider simplifying the tailgate write-up so it can be more easily understood and retained. Reconsider need for each craftsman to sign the morning bulletin.

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Start-Up

Key Observations and Recommendations

DRAFT

- The startup test program schedule is in the early stages of development.

Recommendation: Expedite the effort to reconcile the Component Test and Pre-Operational Test system templates currently loaded in the project schedule to the actual systems' scope and estimated unit rates. Completing this activity is critical to having a reasonable understanding of the overall project completion schedule.

- The current boundary identification package (BIP) turnover rate appears to be overly aggressive and not consistent with the current construction completion schedule.

Recommendation: Reconcile the timing of BIP turnovers to the planned construction percent complete dates. This will impact when Component Testing and Pre-Operational testing activities will occur, thus driving the project completion schedule.

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Project Controls Key Observations and Recommendations

DRAFT

- The Consortium's forecasts for schedule durations, productivity, forecasted manpower peaks, and percent complete do not have a firm basis.
- **Recommendation:** See Schedule Assessment (starts on next slide).
- The Owners do not have an appropriate project controls team to assess/validate Consortium reported progress and performance.

Recommendation: Form Owners' Project Controls team (Project Controls Manager, Lead Planner, Lead Cost). Establish tracking tools separate from the Consortium for verification of project progress and performance. Require the appropriate level of detailed information from the Consortium.

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Schedule Assessment Key Bases

DRAFT

- Data from 21 completed nuclear units and 4 units in the planning phase was used.
- Civil/steel activities:
 - Walked down and assessed based on current progress and performance.
- Bulk commodities and major equipment:
 - Logic and installations derived from Bechtel historical data.
 - Median sustained rates from Bechtel historical data used for creation of installation durations
- Craft:
 - Peak craft limited by building saturation levels.
 - All activities worked on a 48 hour week; second shift at 20%.
 - Indirect to direct craft ratio is 35% (currently 130%).
- Stagger between Unit 2 and Unit 3 commercial operation dates:
 - Based on critical craft peaks (pipefitters including welders & electricians).

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Schedule Assessment Key Assumptions

DRAFT

- Current civil progress and performance will remain unchanged.
- Piping and electrical progress and performance is based on similar Bechtel experience.
- Sufficient quality craft is available up to 3,700 peak.
- All modules and material will be available to support the assessed construction dates.
- Preventive maintenance keeps all equipment operationally ready.
- Quantities provided by the Consortium were used and are accurate:
 - Exception: The annex building quantities are considered unreliable, hence schedule extension due to higher than expected quantities in this area not included.
- No construction equipment limitations.
- Design and work packages are available to support construction need dates.
- The following items do not enter the critical path:
 - NRC approval of license amendment requests
 - ITAAC closures
 - Cyber security
 - Simulator construction and operator qualifications

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Preliminary Results of Bechtel Assessment



Schedule Assessment Preliminary Results

DRAFT

- Preliminary assessment of the Unit 2 and 3 Commercial Operation Dates based on the Key Bases and Assumptions stated above:

	Unit 2	Unit 3
Current COD	June 2019	June 2020
Adjustment	18 to 26 months	24 to 36 months
New COD	Dec 2020 to Aug 2021	June 2022 to June 2023

- The critical path will change from the shield wall to more typical bulk installations through overall project checkout and testing/start-up.
- Increasing schedule confidence to 75% increases the schedule duration by 8 months (included in the 26 months for Unit 2 and the 36 months for Unit 3).
- The stagger between the Unit 2 and 3 CODs extends by 6 months to 18 months.
- The peak monthly construction percent complete is reduced from 3.1% to 2.3%.
- Primary checkout window adjusts by 6 months to 18 months per unit.
- Total craft population increases by 25% to ~3,700.
 - At peak, 850 pipefitters and 730 electricians are required.
- Bulk installation durations increased by a minimum of 30%.

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Schedule Assessment Preliminary Results (cont'd)

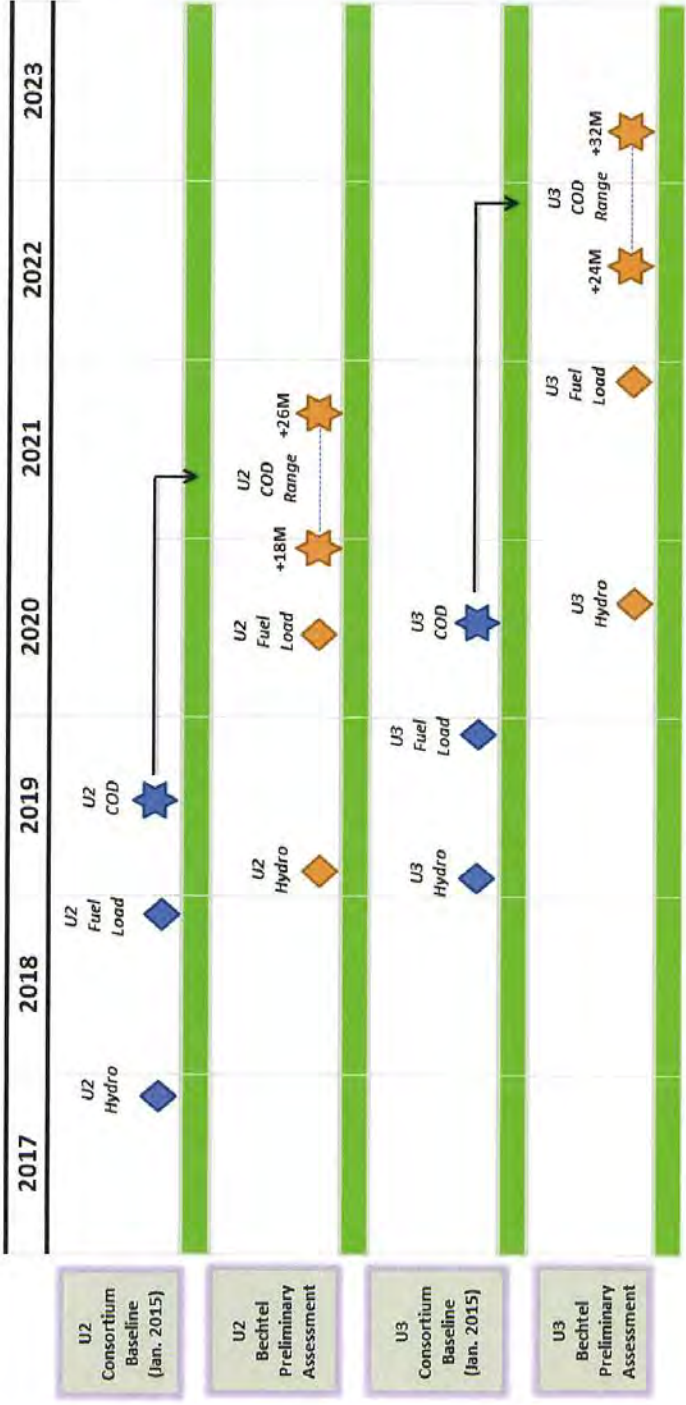
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- Schedule Probability Assessment:
 - Only performed on critical path and top 4 near critical paths because of time limitations.
 - Typical 1,000 iteration Monte Carlo approach.
 - Minimum/maximum windows provided by senior construction personnel on assessment team.
 - Minimum/maximum historical bulk installation rates used as secondary verification method.
 - Only preferential logic considered.
 - Identification of required contingency for assessment purposes only.
 - A more robust approach is needed prior to finalization of any changes to the baseline target schedule.

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Schedule Assessment Milestone Comparison

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Preliminary Results of Bechtel Assessment



Schedule Assessment

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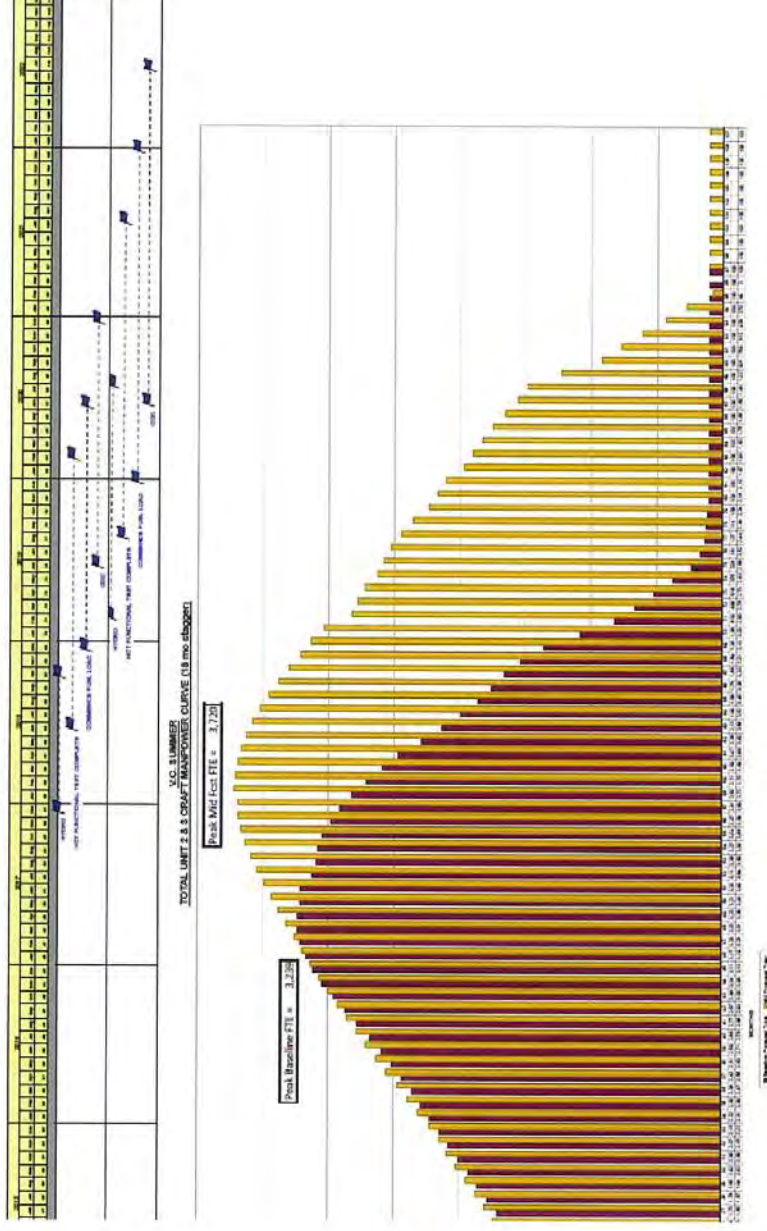
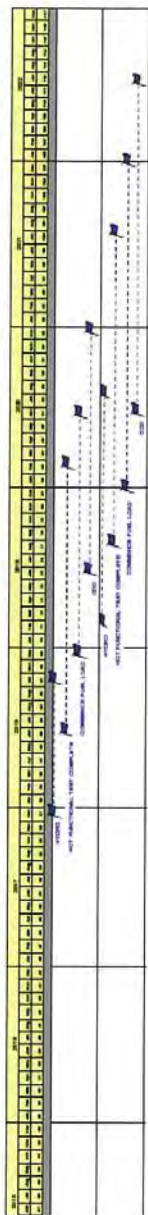


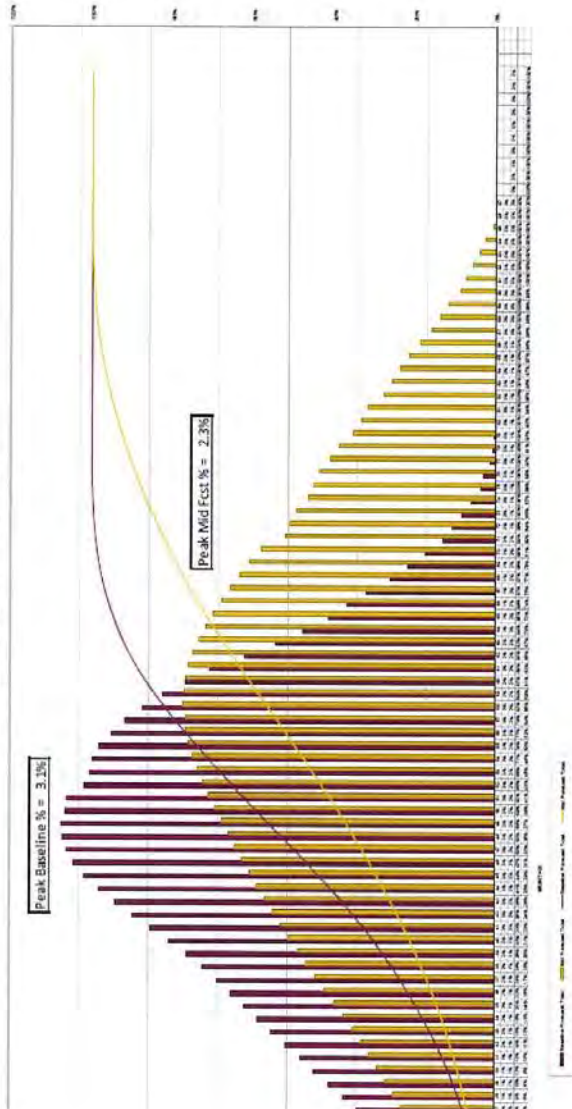
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Schedule Assessment
Construction Percent Complete Comparison

DRAFT



VC SUMMER
TOTAL UNIT 2 & 3 PERCENT COMPLETE CURVE



Preliminary Conclusions

DRAFT

- The AP1000 is a first-of-a-kind technology, 10 CFR 52 is a new licensing process, and these are the first new nuclear plants being constructed in the U.S. in decades. Challenges would be expected.
- However, the V.C. Summer Units 2 and 3 project suffers from various fundamental EPC and major project management issues that must be resolved for project success:
 - The Consortium's project management approach does not provide appropriate visibility and accuracy to the Owners on project progress and performance.
 - The Consortium's forecasts for schedule durations, productivity, forecasted manpower peaks, and percent complete do not have a firm basis. Bechtel's preliminary assessment of the Unit 2 and 3 Commercial Operation Dates indicates:

	Unit 2	Unit 3
Current COD	June 2019	June 2020
Adjustment	18 to 26 months	24 to 36 months
New COD	Dec 2020 to Aug 2021	June 2022 to June 2023

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Preliminary Conclusions (cont'd)

DRAFT

- There is a lack of a shared vision, goals, and accountability between the Owners and the Consortium.
- The Consortium lacks project management integration needed for EPC.
- The WEC-CB&I relationship is extremely poor, caused to a large extent by commercial issues.
- The overall morale on the project is low.
- The Contract does not appear to be serving the Owners or the Consortium particularly well.
- The issued design is often not constructible resulting in a significant number of changes. The construction planning and constructability review efforts are not far enough out in front of the construction effort to minimize impacts.
- There is significant engineering and licensing workload remaining (currently over 800 engineers). ITAAC closure will be a significant effort.
- Emergent issues potentially requiring NRC approval of LARs remain a significant project concern.
- There is a significant disconnect between construction need dates and procurement delivery dates.
- The amount of stored material onsite is significant, creating the need for an extended storage and maintenance program.

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Preliminary Results of Bechtel Assessment



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Preliminary Conclusions (cont'd)

DRAFT

- Construction productivity is poor for various reasons including changes needed to the design, sustained overtime, complicated work packages, aging workforce, etc.
- The indirect to direct craft ratio is very high.
- Field non-manual turnover is high.
- The schedule for the startup test program is in the early stages of development. The BIP turnover rate appears to be overly aggressive.
- The Owners do not have an appropriate project controls team to assess/validate Consortium reported progress and performance.